

MANUFACTURERS' RECORD

A WEEKLY SOUTHERN INDUSTRIAL, RAILROAD AND FINANCIAL NEWSPAPER

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BALTIMORE, DECEMBER 27, 1906.

SOUTH'S WEALTH INCREASES.

The true value of property in the 14 Southern States in 1906 may be conservatively estimated at \$19,377,304,710. This estimate is based upon figures of assessed values of the year compiled by the MANUFACTURERS' RECORD from official sources, some of them coming directly from State executives in telegrams, and comparison with the figures of 1905 is made in the following table:

States.	1905.	1906.
Alabama.....	\$344,224,221	\$373,468,462
Arkansas.....	290,576,108	321,700,000
Florida.....	131,436,593	143,200,000
Georgia.....	577,967,938	624,468,472
Kentucky.....	735,771,834	808,041,918
Louisiana.....	596,821,157	659,271,270
Maryland.....	706,561,456	733,700,000
Mississippi.....	284,343,137	366,799,080
North Carolina.....	461,520,668	479,900,000
South Carolina.....	220,224,505	249,534,422
Tennessee.....	445,832,036	474,500,000
Texas.....	1,139,022,730	1,221,159,869
Virginia.....	554,188,687	629,641,533
West Virginia.....	332,948,351	857,839,868
Total.....	\$6,680,439,421	\$7,743,221,884

Where round numbers are used the figures are estimates, it is believed, below rather than above the figures that will appear when officially available. The comparison shows that there has been an increase in assessed values during the year from \$6,680,439,421 to \$7,743,221,884, or by \$1,062,782,463. It must be remembered that this vast increase is partly accounted for by the operation of new assessment laws in some States, notably in West Virginia, and by some property as realty in Mississippi being reassessed for the first time in seven years. But the total increase in the year is only \$351,062,914 less than the total increase, \$1,413,845,377, between 1900 and 1905, in which period the average annual increase was

only \$282,769,075. The increase between 1905 and 1906 was \$307,113,656 greater than the increase, \$755,668,807, between 1890 and 1900.

In some of the States assessed values represent only a third of the true values, and in others from 40 per cent. to 50 per cent. of the true values. For all 14 Southern States the total assessed value stands for about 40 per cent. of the true value. On that basis the true value of property in the South today approaches \$19,400,000,000. In 1890 the true value of property in the whole country, including the South, was only \$16,160,000,000. The increase in real wealth in the South during the year approximates \$2,656,956,158, which means an increase at the rate of about \$7,280,000 a day, including Sundays and holidays.

Advertisements of Southern localities offering special advantages for the location of manufacturing enterprises will be found on pages 72, 73 and 74.

EDUCATIONAL TRUSTS CO-OPERATING.

In a letter to the MANUFACTURERS' RECORD referring to the wire-pulling of Ogdentites for the election of a zealous, persistent apologist of Ogdensism to the presidency of a great Virginia educational institution, Mr. Ashby Watkins of Richmond, Va., writes to the MANUFACTURERS' RECORD as follows:

With Carnegie pensioning veteran educators and establishing a realm of dependence outside of the reward earned by a man's loyalty and fidelity to his chosen profession, and with Oden with his small army of satellites instituting and fostering a system of education which has a tendency to reduce our schools and colleges to a position of subservience and passivity, truly the Southern people have fallen upon evil days and need to go back and reread the pages of their history to get the proper perspective in order to view this movement in its true light.

It will be recalled that accompanying a recent iteration of the rather overworked announcement of gifts from the General Education Board to Southern colleges conditioned upon their raising other funds some time in the future, it was announced that the General Education Board and the Carnegie Board for pensioning professors had reached an informal understanding "that in all matters affecting the development of higher education the two boards will endeavor to work in harmony." At the time the MANUFACTURERS' RECORD pointed out that the plain English of the announcement was that colleges which wish to get a dab of the \$10,000,000 fund of the General Education Board must fall in line for Carnegie pensions for their professors, or that colleges seeking to evade their own duties as to providing for their professors in old age and hence scrambling for a dab of the Carnegie \$10,000,000 or \$20,000,000 pension fund, must bestir themselves in support of the scheme of the General Education Board, or Ogdensism, involving the suggestion to negroes that

the "South is rising from Saxonism into humanity." The situation is well summarized by Mr. Watkins. But he probably is unaware of the real significance of the latest manifestation.

Staked with its original tentative \$1,000,000, Ogdensism swept through the South in 1902 in its special train of eight parlor cars. About the last place it visited was the Virginia Polytechnic Institute at Blacksburg, a center of real education and of self-respect and self-reliance. The visitors found things so different there that one of them was moved to remark, "This is the first college we have visited where they didn't beg for money." And now Ogdensism would bring that noble institution to the plane where it has already corralled the University of Virginia, Washington and Lee University, Richmond College and other institutions in Virginia. God save the Commonwealth!

TO HELP MISSISSIPPI.

The organization last week at Jackson of a State immigration league for Mississippi ought to strengthen the hands of Mr. E. E. Blakeslee, State Commissioner of Agriculture, who has been doing effective service in making known to the world the opportunities offered by Mississippi to the farmer, the manufacturer and the general investor. The league will work for an appropriation by the State sufficient to carry on a practical campaign for immigration and to further intelligent co-operative efforts of all the industrial, commercial and agricultural elements in the State to the same end. This organization promises to bring Mississippi into line with such States as Maryland, Virginia, South Carolina, Georgia, Alabama and Louisiana in the cause of immigration, and it should encourage other Southern States lacking the proper machinery to take immediate steps to overcome the deficiency. To render the most efficient service the organization should adopt a plan best suited to the needs of Mississippi, and should not be diverted from its main purpose by any schemes looking to an immigration organization assuming to cover the whole South, and should utterly abhor "Southern immigration" conferences, conventions and congresses.

MISTAKEN ABOUT FORESTRY.

It is hoped that Congressman Slep of Virginia was not thoroughly understood in some remarks attributed to him regarding lumbering. He is reported as saying:

I reckon I own my land, and I can do as I please with it. Why should I let the timber on my land stand and decay just to please the forest service? It is as good as it will ever get, and, besides, we need more cleared land. Farming land is growing more valuable every day. No, sir, even if the forest service does tell us we had better let our timber stand, we in the Southwest will continue our lumbering business as we do now. There never was so much money to be made out of the lumbering business as there is today, and I believe there never will be any more made out of it than there is now. That is the reason why I am sawing wood.

Those remarks indicate an utter lack of comprehension of the aims of the forest service. Its purpose is not to destroy the lumbering interest of the country, but to preserve it, and also to prevent the destruction of the reservoirs or great streams, especially those having their sources in the Southern Appalachians. The forest service of the National Department of Agriculture is an outgrowth of the rebound in this country from the shortsighted and wasteful methods of handling forests that have turned vast tracts of timber land into barrens and have threatened the permanent loss of supply of certain important woods. The rebound has created a conviction that there is no more reason why a timber tract should be permanently exhausted than that a piece of land should not be maintained forever as of value in agriculture. Opposition to scientific forestry, which means common-sense forestry, on the ground that there never was so much money to be made out of the lumbering business, and that more cleared land is needed for farm operations, is akin to the policy, once the normal in some parts of the country, of cutting down or burning magnificent timber simply for the purpose of gaining new land for farming and letting the old fields wash or rut away almost beyond reclamation. It is a manifestation of the spirit which is sometimes called American optimism, but is often really American foolhardiness, the spirit which assumes that any liberties whatever may be taken with nature, and that somehow or other nature will not resent it.

But compulsory substitution of one kind of wood in building operations for another kind once plentiful, the search for other substitutes with stringency developing in many directions, the drying up of formerly abundant springs, the dwindling of mountain streams, and the sudden and devastating floods in rivers once steadily flowing as sources of mechanical power and as the mediums of commerce have aroused the practical interest of thousands of men in all parts of the country who live and work not for the day alone, but who look to the distant future, and as provident men would provide against it. They know that lumbering operations may be conducted upon a profitable as well as an economic basis, and that such conduct is absolutely necessary for the maintenance of the lumber business. They will regret, if it is true, that any member of Congress, and especially any member from the part of the South included in the plan for a great forest reserve, is serious in his opposition to the wise policy of the forest service.

WOULD DEAL WITH AMERICA.

In one day's mail last week the MANUFACTURERS' RECORD received letters from seven different foreign cities—Christiania, Norway; Shibaku, Tokyo, Japan; Ahmedabad, East India; Tripoli, North Africa; Buenos Aires, Argentina; Tokyo, Japan, and Barcelona, Spain—inquiring about American machinery,

etc. This is another illustration of the wide reading given the MANUFACTURERS' RECORD by men seeking to trade with the United States and to get in touch with the manufacturers of this country.

CHANGES FOR GOOD IN TEN YEARS.

In the six years from 1900 to 1906 the value of farm property in the United States advanced from \$20,400,000,000 to \$28,000,000,000, a gain of \$7,600,000,000. This, bear in mind, is the gain in value of property, and does not take into account the great profits which the farmers have made on their crops for each year since 1900. It is a story of marvelous development. This gain of \$7,600,000,000 is more than two-thirds as great as the total deposits in all the national, State, private and savings banks and all the loan and trust companies in the country combined. Vast as is the industrial progress of the United States, the total investment in all the manufacturing interests of the country is \$14,000,000,000, or less than twice as much as the actual gain in the value of farm property in six years. More than that, the entire capitalization, stocks and bonds, of all the railroads of the United States is about \$12,000,000,000 to \$13,000,000,000, and the farmers have added to the value of their property within six years, without counting their annual profits during that time, two-thirds as much as the total capitalization of our vast railroad system, which represents one-half of the railroad mileage of the world. And the vast increase in wealth which the farmers have made is but an indication of what will be the enhancement in the coming years. Just as the railroads went through receiverships and bankruptcies some years ago, so the farmers had their years of hard times, and as the railroads have come out of poverty into great prosperity, so the farmers are now reaping their harvest of enhanced values and of an ever-increasing demand for their products.

Nothing in all the marvelous material advance of the country of recent years is more wonderful or more far-reaching in its consequences for good than the upbuilding of the agricultural interests of the country. When we undertake to discuss business conditions and try to judge of the future by the light of the past we must bear in mind the complete change, the revolution as compared with anything in the past, which exists today in the agricultural interests. In years that are gone, when the West was being built up by farm mortgages, when nearly every man locating in that section had to borrow money on which to make his start, and when the farmers of the South were still suffering from the destruction and desolation of the war, conditions were so wholly unlike what we have today that the past is not a good lamp by which to guide our feet for the future. We are facing conditions unlike anything recorded in history and unlike anything that the most daring optimist would have undertaken 10 or 15 years ago to forecast. We have come upon times where prosperity instead of poverty is the burden of the nation's troubles, where railroads are swamped by their inability to provide engines and cars to handle the traffic that is offered them, where car and locomotive works are so crowded with business that it is almost impossible to make any material gain in the number of cars and engines for many months to come; a time in which iron and steel and machinery people are so busy that it is difficult to expand rapidly enough by the building of new car and loco-

motive works to keep up with the pressing necessities of the railroads; a time wherein no man seeks work in vain; where instead of a million men who tramped the streets of our cities 10 years ago, a time when thousands of farmers felt that they were hopelessly in debt, we find every line of business, from the mercantile to the manufacturing, the railroad and the agricultural, begging for new laborers, and the farmer no longer compelled to look upon the dark side of life, but to join in the spirit of rejoicing over abounding prosperity. The great middle classes—the salaried men and the people of fixed income—are the ones who have not yet shared to the full extent in this prosperity, for the increasing cost of living has scarcely been offset to them by increase of salaries or of incomes. The farmer and the day laborer, the mechanic and the railroad man, the merchant and the manufacturer, are all sharers in this wonderful prosperity which is sweeping not only over our own favored land, but over all the world.

And yet at this season of rejoicing, at a time when men should be contrasting the present with the poverty and despair of 10 or 12 years ago, when men should be thinking of the fact that millions of new laborers are needed instead of millions being unable to find employment then, there is a spirit of discontent and unrest for which there is no justification. The preachers of the gospel of hate have undertaken by falsehood and misrepresentation and by turning and twisting facts to create in the mind of the people an impression that all the wealth of the country is being concentrated into a few hands. Men who have no conception of the strain under which the railroad people are living in order to try to meet these conditions, who talk as though new cars and new engines and new track could spring into being by a wave of the hand, are denouncing railroads because they are unable to move freight rapidly enough. Such people seem to forget the fact that the railroads are the great sufferers. Talking a few days ago with one of the great railroad men of America, he told of the struggle of his company to provide facilities to meet the business that was pressing upon them, and how, by reason of the business being so far beyond their facilities, the cost of handling it was so great that instead of being able to handle their traffic at 60 to 65 per cent. of the gross receipts it was costing them 75 to 80 per cent. So far as that road is concerned—and many others are in just the same condition—a smaller volume of business would give far larger net returns and would greatly lessen the strain on the body and mind of its managers and its men.

The MANUFACTURERS' RECORD dared five years ago to predict this condition and to say that the railroads would at this time be swamped with business, and that there would be such a burst of activity as would tax all the powers of the business interests of the country. But few believed that prediction and none prepared for it. President Cassatt of the Pennsylvania Railroad has been quoted—but how correctly we cannot say—as having stated five years ago that he proposed to duplicate the entire Pennsylvania Railroad system, planning it with a view to taking care of the business ahead for 25 years, and recently he has been quoted as saying that the plans which he undertook five years ago would within five years instead of twenty-five prove to be too small for the needs of the times. When

President Cassatt started on this broad campaign of development he had to meet the severest criticism, and many prominent men and papers seriously discussed the question of whether he had not lost his mental balance. Over and over again it was rumored that his directors would be compelled to insist upon his retirement or the withdrawal of his vast plans for enlargement of the Pennsylvania's facilities. Any other man who had undertaken a similar campaign as President Cassatt had outlined would have had to meet the same kind of criticism. But human nature is shortsighted. The very men who then denounced the railroad manager who dared to make such a move would today be criticising him because his facilities were unequal to the traffic. And then we are told over and over, not only by sensational newspapers of the day, but from sources which ought to be ashamed of putting forth such false representations, that the great business organizations of the country are founded on fraud and deceit. They are called destructive monopolies, seeking their own enrichment by wrecking others. And where human nature exists as it is today men will strive for monopoly in trade, and every critic of any successful monopoly, if there be such a one, would himself be a monopolist if he could. His only trouble is that someone else has been able to do what he could not accomplish, and putting forth a claim of great virtue, he undertakes to win popular favor by denouncing the success of others.

At this the Christmas season it behooves the country to take account of itself, and, like the merchant, take stock and see where it stands; look over the vast and wonderful accumulations of the last 10 years, see the wealth that has been added to the farmers, to the manufacturers, to the merchants, the mechanics and the day laborers, see the flush of prosperity over the whole nation, and contrast it with the poverty and wretchedness of 1896, and then reverently thank God for the mighty change.

PHILANTHROPY THAT PARALYZES.

At this season columns of figures are published itemizing the millions of dollars that have been contributed during the year by philanthropy in one cause and another. For much of the philanthropy involved the columns of figures are impressive; they are oppressive for thoughtful minds concerned with men rather than with money. For much of the popular philanthropy of the day has taken the direction of education so called. It is education, but it is the education that is training a generation of boys and girls to dependence, to degeneracy, to invertebrate mentality and morality. A phase of it is strikingly pictured by the Brooklyn Daily Eagle. Discussing "assisted education" the Eagle says:

Assisted immigration is a peril. Assisted digestion is decadence. Assisted education partakes of the nature of both. Yet there will always be statesmen ready to face the peril; valetudinarians to risk the decadence, and philanthropists who cannot see that the more a student is aided to live easily, the more his character suffers.

Take our theological seminaries, for instance. Subsidized students, starting in with more devotional enthusiasm than brain force, do not so develop as to come face to face with the problems of faith and non-faith till they are so deeply in debt to the assisting religious body that they cannot expect to break loose and clear themselves of the debt in less

than a series of years, if study makes it impossible for them to conscientiously accept the creed. The alternative to this long struggle is a quick accession to an easy, if not liberal, livelihood to be secured by anesthetizing conscience. Most of those whose faith is unsettled drift, nevertheless, with the tide, and take the easy livelihood.

Hence the ministry of every denomination is fairly sprinkled with men who are conscious hypocrites, except they are able temporarily to forget themselves. The habit of quibbling and of evasion grows with years of preaching from pulpits which permit of no interruption or question by listeners. Spiritual deadness communicates itself from cleric to communicants. The whole outcome of the system is unfortunate.

If a young man has a call to study he will make the opportunity. If a young man has a call to the ministry he has a right to a conscience unhampered by the memory of benefactions. Character is of more importance than acquirements. Assisted education is apt to be an unmitigated failure.

It is not the ministry of the pulpit alone that is being so debauched. The canker is eating its way all through the educational system of the country, from top to bottom. It is the quintessence of mildness to call it "an unmitigated failure." It is an unmitigated evil. It is execrable. It is substituting cash for character. It is ranking boodle above brains. It is substituting chicane and subservency for scholarship.

One of its most menacing agencies, popularly known as Ogdensism, is making a special drive with bargains at the denominational colleges which should be the means of setting young men and women upon right paths, but which, under the demoralization of millonthropic impulses, are bound to beget a breed of curses for humanity. For years the MANUFACTURERS' RECORD has maintained a vigorous warfare against this philanthropy that paralyzes the moral fiber of men and women. It has pointed out the fact that presidents of universities and colleges and other educational institutions cannot scramble with hot-foot and tongue out after doles from an educational trust without the students coming under the degradation. We are glad to see such substantial papers as the Brooklyn Daily Eagle joining in the warning, and we hope that it will not be long before the religious press, so called, will screw up enough moral courage to do its duty in the same direction.

Does the South know the character and purpose of more than one lobby working between Washington and New York under the pretext of helping the South to solve its labor problems? Is it aware of the number of money-making schemes hanging upon the desire of the South for legitimate immigration? Is it aware of the snakes wriggling through the movement for amendment of the National Immigration laws?

WITH THE RISE OF PRICES.

The International Steam Pump Co. announces that it has been compelled, by the steady advance in the cost of raw materials, to increase the prices of its products. This policy is one which must, we believe, prove almost universal. With the advance in labor, the rising cost of living and the steady advance in all products, both manufactured and agricultural, there must of necessity be a general tendency to higher prices for finished goods. Manufacturers of machinery and general products of that character have not yet shared fully in the

advance in the cost of production. With the present high prices for iron and steel and the high cost and scarcity of labor there must inevitably be a readjustment of values in many directions. The action of the International Steam Pump Co. will doubtless be followed by many other interests.

SOUTHERN FARM MAGAZINE.

At the time of the passage of the act providing for the release from internal revenue tax of alcohol denatured for industrial purposes the MANUFACTURERS' RECORD led the country in pointing to the fact that the act had been radically modified in the Senate and to the possibility that it might have an effect directly contrary to the expectations of the great mass of supporters of the free denatured alcohol movement. Since then there have been reinforcements of the contention that the hopes of the farmers of the country to profit vastly from the new legislation will hardly be realized. This thought is elaborated in the *Southern Farm Magazine* of January, which takes the ground that the operation of the act should be suspended pending amendments calculated to remove objections to it vital from the standpoint of hundreds of thousands of manufacturers and farmers of the country.

Other topics in this issue of special interest to farmers deal with profits in canning, winter work on the farm, cowpeas, alfalfa, inoculating cereals, poultry, horticulture, cattle and hogs and grasses, with efforts of science to counteract wasteful methods in handling natural resources, the water supply for the farm home, the magnificent opportunities for Southern farmers and the developments of immigration to South Carolina, Maryland, Mississippi, Georgia, Louisiana, Texas, Tennessee and Virginia.

Of wider interest, perhaps, are the discussions of ignorance about the Southern negro, of the agitation for stronger centralization in government, of simplified spelling and of the many fads afflicting the country.

The *Southern Farm Magazine* is published monthly by the Manufacturers' Record Publishing Co. Its regular price is \$1 a year, but new subscribers this month will receive it for 50 cents.

OBVIOUS AND ABSURD.

The obviousness of *The World's Work* of New York, publishing at this present vital moment full-page display advertisements in the newspapers of Atlanta, is equalled in suggestion only by the reference in the advertisements to a number of articles published in the past by *The World's Work* as an indication that, as it says, "it has paid more attention to the South than any other American magazine." There is a reference to "Child Labor in Southern Cotton Mills," by Irene M. Ashby, said Irene being recalled as one of the representatives of Samuel Gompers in the movement, under the guise of philanthropy, to lead the South into social agitation; to "The Southern Educational Board—A New Patriotic Force," "The Southern Educational Conference," "Patriotism and Education in the South," "Two Leaders of Educational Statesmanship," "The True Voice of the South" and "The South and the Passing of the Missionaries and Orators." These articles will be recalled as reflecting the views of the editor of *The World's Work* and his allies in the Ogden Educational Movement for the South, views hinging upon the opinion that only the missionaries and orators more or less identified with Ogdenism and its menace should be given countenance by the South. If *The World's Work* had any influence with the substantial South it would be a matter of regret that "it has paid more attention to the

South than any other American magazine." Thoughtful citizens of Atlanta, though, will be at least amused by the attention that the magazine is now paying to Atlanta by way of advertisements.

SUGGESTIONS.

Referring to the pamphlet reprint from the *American Review of Reviews* article showing America's amazing advance, Mr. N. W. Halsey of N. W. Halsey & Co., bankers, New York, writes to the MANUFACTURERS' RECORD as follows:

"I read this in the *Review of Reviews* with special interest, and wish to express my admiration for the very clear and interesting way in which you have presented these facts. The growth of the country everywhere has unquestionably made a great many things good about which there was considerable doubt a dozen years ago. In my experience through the country, investigating localities and corporations who are in the market to borrow money, I very frequently declined to take things up because I could not regard them as absolute security for the investment of money by those who are simply looking for a fixed return, but this growth, which you so admirably portray, has made most of these things not only ample security for the money asked of those who were only to receive bonds, but has made fortunes for the people who showed their confidence and exercised their skill in developing the localities and the properties. It is a matter of great interest to watch these developments, and to a man whose faith and confidence in a community was derived very largely from his observations of what can be produced in the way of wealth from soil it is of special interest to note the prosperous conditions now prevailing in our Southern States, where the soil itself is thin and where methods of treating it have been neglected.

"It is to be hoped that the great stimulus given immigration will supply one of our greatest needs in the way of hands to develop these wonderful resources, and I wish that you, and others of your ability, would devote yourselves to solving the serious problem of the continued rush to large centers of population, which is progressing to the detriment of the development of the great resources upon which we rely, as so forcibly exploited in your able article."

Referring to the same subject, Hon. Finis J. Garrett, Representative in Congress for Tennessee, writes:

"I was particularly struck with one suggestion that you offered in it relative to drainage of swamp lands. I am from the ninth Tennessee district, which is composed of eight counties lying in the northwestern portion of Tennessee, three of them bordering on the Mississippi river, and all these counties are traversed by small rivers and creeks, so that while we have no swamp lands in the strict sense of that word, we have immense quantities of river bottom and creek bottom land subject to overflow. I have been for some time much interested in devising ways and means for the drainage of these lands, and quite recently I wrote and sent to two of the State papers in Tennessee a communication urging the importance of our General Assembly providing the legal machinery necessary to enable this work to be carried out."

The Chamber of Commerce of Lexington, Ky., has elected Messrs. J. Clay Hunt, president; F. R. Toewater, Jouett Shouse and F. B. Carr, vice-presidents, and John B. Payne, J. Mortimer Levering, J. W. Porter, I. N. Combs, Henry Milward, Harry R. Brower and George K. Graves, directors. The Chamber, of which Mr. John Cramer is secretary, has 144 members.

RAILROAD CONSTRUCTION DURING 1906.

The South and Southwest Built More Than 3200 Miles of New Line, With Over 4400 Miles in Prospect for 1907.

[Written for the Manufacturers' Record.]

A careful review of railroad construction in the South, including Missouri, Indian Territory and Oklahoma, has been prepared by the MANUFACTURERS' RECORD, and shows that during the year 1906 there have been built a total of 3261.9 miles of line, which is over 600 miles more than were built in 1905, and it is also shown that more than 4400 miles are projected in the same territory for 1907. The amount of the new construction during 1906 which is credited to the South (exclusive of Missouri, Indian Territory and Oklahoma) is 3055 miles, and the amount to be built therein next year is nearly 4200 miles. The estimates for 1907 do not, as a rule, include figures for new corporations that have not begun construction, but in a very few instances, where the work is practically assured, they are taken note of. Moreover, in some cases old companies will undoubtedly build more line next year, for instance, the Southern Railway, but they are not ready to announce their plans, and, consequently, their projected work cannot be noted. The amount of electric railway built is small, being about only 100 miles for 1906, although there are several projects of note in prospect for 1907, and in this variety of construction record is made only of track that will be used for both passenger and freight service, street railways not being included.

As usual, the MANUFACTURERS' RECORD in preparing this review made a thorough canvass of all the railroad companies throughout that part of the country covered by it, and in most cases the figures given were obtained through the courtesy of railroad officials. Other data collected during the year, much of it also official, was likewise employed to round out these statistics, which cover only new line constructed, but not second track or sidings, of which much were built by trunk lines.

A peculiarity of railroad construction during 1906 is that Texas and Louisiana are far ahead of the other States in the record of line built, but Arkansas is close behind them. Texas is away in the lead with a total of 810 miles (she had only about 300 miles in 1905), Louisiana second with 471 miles, Arkansas third with 282 miles, Mississippi fourth with 232 miles, Georgia fifth with 226 miles, West Virginia sixth with 215 miles, Virginia seventh with 162 miles, Florida eighth with 154 miles and Alabama ninth with 102 miles. Construction in Oklahoma and Indian Territory has slackened off considerably in the last year or two, but it has developed rapidly in both Louisiana and Texas, each of which promises to make a high record next year. In fact, the outlook for 1907 indicates that very active work will be done. The States projecting over 100 miles of line are Texas, 834 miles; Florida, 503 miles; Mississippi, 426 miles; Georgia, 411 miles; Louisiana, 408 miles; Virginia, 322 miles; Arkansas, 263 miles; Alabama, 226 miles; North Carolina, 207 miles; West Virginia, 160 miles; Tennessee, 151 miles; Kentucky, 132 miles; Indian Territory, 128 miles; South Carolina, 113 miles.

Besides the construction of new line, the railroad companies have generally followed a policy of making liberal improvements. They have built not only second track, but have made and are making at various points revisions of line to secure better grades and curves, besides erecting many new depots, warehouses,

docks and other terminal facilities. This sort of work will be continued through the coming year, and much construction of this nature is already begun.

The following table shows the amount of new line built in 1906 and also the construction proposed for 1907 in each State and Territory covered by the review:

	1906.	1907.
Alabama.....	102.02	236.98
Arkansas.....	282.59	263.50
District of Columbia.....	5	5
Florida.....	154.70	603
Georgia.....	226.10	411
Indian Territory.....	45.40	128
Kentucky.....	74.65	132.55
Louisiana.....	471.75	408.76
Maryland.....	35.5	25
Mississippi.....	232.12	426
Missouri.....	76	40
North Carolina.....	192	207.50
Oklahoma.....	85.4	46
South Carolina.....	27.7	113
Tennessee.....	70	151.5
Texas.....	810.30	834.81
Virginia.....	162	322.25
West Virginia.....	215.70	160.50
Total.....	3261.93	4405.85

Here follows a detailed statement of the amount of line built by the various roads during the year just closing, and as far as possible the new construction decided upon and which will probably be built in 1907:

Ablene & Northern—Ablene to Anson, Texas, 24 miles, and Anson to Stamford, Texas, 14 miles; total, 38 miles. (See Wichita Valley.)

Alcolu—Beulah to Mott's Cross Roads, S. C., 5 miles. For 1907, on the Paroda Railroad from a connection with the Alcolu Railroad 10 miles southeast of Lynch's river to Lanes, S. C., about 30 miles.

Anderson Traction Co.—From Anderson, S. C., 5 miles. For 1907, continuation of extension to Belton, S. C., 5 miles.

Angelina & Neches River—Kelty's to McCoy, Texas, 12½ miles.

Apalachicola & Northern—For 1907, between St. Joseph Bay, Apalachicola and Quincy, Fla., about 75 miles.

Arkansas Southeastern—Luter, La., to River Junction, La., 25 miles. For 1907, continue extension to Monroe, La., 15 miles.

Arkansas, Red River & Paris—Morris Ferry, Ark., 1½ miles toward Paris, Texas. For 1907, 10 miles additional.

Atchison, Topeka & Santa Fe—On the Texas & Gulf between Longview, Texas, and Waterman, Texas, and on the Boren spur, 15 miles. (Also see Gulf, Colorado & Santa Fe and Denver, Enid & Gulf, which are in the same system.)

Atlanta & St. Andrews Bay—Dothan, Ala., to Cottondale, Fla., 21 miles, and from Cottondale to White Lake, Fla., 10 miles. For 1907, White Lake to Panama City, Fla., about 45 miles. Construction may also be started next year from Dothan northward to Opelika, Ala., about 100 miles.

Atlanta, Birmingham & Atlantic—Talbotton, Ga., to the Chattahoochee river, 67 miles. For 1907, from the Chattahoochee river to Bessemer, Ala., 145 miles, and from Chalybeate to Atlanta, Ga., 76 miles; total, 221 miles.

Atlantic Coast Line—Continuation of extension of the Jacksonville & Southwestern toward Perry, Fla., 20 miles, which is expected to be completed before July next, about 55 miles remaining to be finished up.

Beaumont & Great Northern—Completion of line between Trinity and Onalaska, Texas, 12½ miles. For 1907, Onalaska to Livingston, Texas, 15 miles.

Beaumont, Sour Lake & Western—Between Sour Lake and Houston, Texas, 25 miles. For 1907, completion of line, 40 miles.

Birmingham Southern—For 1907, branch in Jefferson county, Alabama, 3½ miles.

Black Mountain—For 1907, Pennington Gap, Va., to Imboden Mines, 17 miles.

Brinson—From Springfield, Ga., toward Savannah, 5 miles. For 1907, extensions to Savannah and Athens, Ga., on which 55 miles have been located.

Buffalo Creek & Gauley—Hamric's Run to Gulf, Clay county, West Virginia, 3 miles. For 1907, continuation of line to Camden-on-Gauley, W. Va.

Burr's Ferry, Brownell & Chester—Rockland, Texas, to Aldredge, Texas, 8 miles. For 1907, Aldredge to Brownell, Texas, 23 miles.

Cairo & Kanawha—For 1907, extension to

- Smithville, W. Va., 8 miles.
Canton—A belt line at Canton, Baltimore county, Maryland, 4 miles.
Carthage & Pinehurst—For 1907, from Carthage to Pinehurst, N. C., 12 miles.
Carolina Mineral—About 10 miles between Charlotte, N. C., and Lancaster, S. C. For 1907, completion of line between those points, 30 miles.
Catawba Valley—For 1907, Salem, Va., to Mason's Cove, 9½ miles.
Central of Georgia—Greenville to Raymond, Ga., 23.7 miles; Henry Ellen to Margaret, Ala., 13 miles; total, 36.7 miles.
Central of South Carolina—Heath Springs, S. C., to quarries of Southern Granite Co., 6 miles.
Charleston & Summerville Electric—For 1907, Charleston, S. C., to Summerville, S. C., 22 miles.
Charlotte Harbor & Northern (formerly the Alafia, Manatee & Gulf Coast)—Fort Oden, Fla., to Boca Grande, at the south end of Gasparilla Island, Fla., 36 miles. For 1907, Arcadia to Plant City, Fla., 60 miles.
Chattanooga Southern—Branch, from a point on the main line 13 miles south of Chattanooga, to Lookout mountain, 1 mile.
Chesapeake & Ohio—The Potts Creek branch from Covington, W. Va., up Potts creek, 21 miles.
Chicago, Rock Island & Gulf—For 1907, Irving to Carrollton, Texas, 11 miles.
Chicago, Rock Island & Pacific—For 1907, Alexandria to Eunice, La., 55 miles. The company has completed during the past year the Little Rock & Southern from Haskell to Crossett, Ark., 367.3 miles, with a branch of 36 miles to Eldorado, Ark., or a total of 143.3 miles, which was credited to construction for 1905.
Coal River—On Little Coal river in Boone county, W. Va., 27 miles, via Madison, W. Va., including a branch of 5 miles up Laurel Fork; also from Hollyhurst to Bull Creek, W. Va., 5 miles, and Sproul to Rock Creek, W. Va., 17½ miles; total, 44½ miles.
Colonial Coal & Coke Co.—Dorchester to Sutherland, Va., 3 miles.
Colorado Southern, New Orleans & Pacific—Between Baton Rouge, La., and De Quincy, La., about 50 miles of track laid. For 1907, completion of line, 90 miles.
Crittenden—Earle, Ark., to Heth, Ark., 15 miles.
Dardanelle, Oia & Southern—Dardanelle, Ark., to Oia, Ark., 16 miles.
Davis & Turner's Falls—Davis, I. T., to Turner's Falls, I. T., 6 miles.
Dawson Springs & Madisonville—Dawson Springs, Ky., to coal mines, 5 miles.
Denison, Bonham & New Orleans—For 1907, Bonham to Clarksville, Texas, 100 miles.
Denver, Enid & Gulf—Cherokee, Okla., to the northern boundary of the State, 13.4 miles. This line has been also continued to Sun City, Kan., 59.7 miles from Cherokee. Next year it is to be extended to Belvidere, Kan., 10 miles.
De Queen & Eastern—Provo to Dierks, Ark., 8 miles.
Doniphan, Kensett & Searcy—Kensett to Doniphan, Ark., 1½ miles. For 1907, Kensett to Searcy, Ark., 4½ miles.
Durham & Charlotte—Little River to Troy, N. C., 4 miles.
Durham & Southern—Apex to Durham, N. C., 20 miles. Next year the line between Apex and Holland will be revised.
East Carolina—Farmville, N. C., toward Hookerton, N. C., 5 miles. For 1907, continuation of same line to Hookerton, 7.5 miles.
Eldorado & Wesson—Eldorado to Wesson, Ark., 10.19 miles.
Ellaville, Westlake & Jennings—Westlake to Higgon, Fla., 30 miles.
Emmitsburg—For 1907, an extension toward Frederick, Md., is proposed.
Fairmont & Clarksburg Traction Co.—Fairmont to Clarksburg, W. Va., 25 miles.
Fayette & Fayetteville Electric—For 1907, Fayetteville, W. Va., to Fayette Station, 2½ miles.
Flint River & Gulf—Ashburn, Ga., to Bridgeboro, Ga., 32 miles.
Florida East Coast—On extension from Homestead, Fla., to Key West, Fla., about 30 miles. For 1907, completion of line to Key West, 106 miles.
Fourche River Valley & Indian Territory—Camp C to Camp D, 5.1 miles; near Eau, Ark. For 1907, extension from Camp D, about 35 miles.
Gainesville & Gulf—For 1907, extension from Fairfield, Fla., to Tampa, Fla., about 100 miles; also from Gainesville toward Jacksonville, Fla., about 50 miles; total, 150 miles.
Gainesville Midland—Jefferson to Athens, Ga., 18 miles.
Gainesville, Whitesboro & Sherman—From Gainesville, Texas, about 8 miles. For 1907, continuation of line.
Galveston, Beaumont & Northeastern—Vidor, Texas, to Weiss, Texas, 17 miles. For 1907, continuation of line, which is chartered, for a distance of 100 miles.
Georgia & Florida—For 1907, Augusta, Ga., to St. Clair, Ga., 32 miles; Midville to Summit, Ga., 17 miles; Summit to Statesboro, Ga., 25 miles; Vidalia to Hazlehurst, Ga., 29 miles; Hazlehurst to Brixton, Ga., 17 miles; Nashville to Valdosta, Ga., 23 miles; Sparks, Ga., to Adel, Ga., 3 miles; total, 150 miles. This is the railroad merger effected by J. S. Williams and associates.
Georgia Coast & Piedmont—Ludowici, Ga., to Glenville, Ga., 19 miles. For 1907, extension to Brunswick, Ga., from Darien, 18 miles.
Glade & Guyandotte—Glade to Crow, W. Va., 10 miles. For 1907, Crow to Mullins, W. Va., 20 miles.
Glen Jean & Kilsyth—For 1907, Glen Jean to Kilsyth, W. Va., 8 miles.
Grandin & Northwestern—Winona Junction, Mo., to West Eminence, Mo., 15 miles.
Gulf & Ship Island—Completion of Silver Creek branch, 16.5 miles, all in Mississippi.
Gulfport & Mississippi Coast Traction Co.—Gulfport to Biloxi, Miss., 12 miles. For 1907, perhaps 10 miles more.
Gulfport & Northwestern—For 1907, Gulfport, Miss., to Poplarville, Miss., 46 miles.
Gulf, Colorado & Santa Fe—Davis to Sulphur, I. T., 9.4 miles, on the Eastern Oklahoma Railway; De Ridder to Cravens, La., 18 miles, on the Jasper & Eastern Railway; total, 27.4 miles. For 1907, Cravens, La., to Oakdale, La., 25 miles.
Haley - Rucker Northwestern—Ittabena to Quiver, Miss., 9 miles. For 1907, extension to Glendora, 35 miles.
Hampshire Southern—For 1907, Romney to Moorfield and Petersburg, W. Va., 28 miles.
J. M. Hastings Lumber Co.—Jacksonburg, W. Va., to Richwood, W. Va., 4 miles.
Hayneville & Montgomery—Tyson to Hayneville, Ala., 9 miles.
Hoffman Heading & Stave Co.—For 1907, 9 miles of line out of Mount Pleasant, Texas.
Holston River—For 1907, Persia, Tenn., to Moccasin Gap, Va., 40 miles. (Will be connection from Virginia & Southwestern to the Southern.)
Houston & Texas Central—Cutoff from Nelleva Junction to Mexia Junction, Texas, 94 miles.
Houston Belt Line—At Houston, Texas, 8 miles. For 1907, 16 miles.
Illinois Central—Connection with the Mobile & Ohio at Jackson, Tenn., 3 miles; Wickliffe, Ky., to Winford, Ky., 3.9 miles, double track; Woodstock, Tenn., to Leewood, Tenn., 7.5 miles, double track; total, 14.4 miles. For 1907, Atoka, Tenn., to Kerrville, Tenn., 5.5 miles; Corinth, Miss., to Haleyville, Ala., 30.23 miles; total, 55.73 miles. On the Yazoo & Mississippi Valley (1906), Silver City, Miss., to Holly Bluff, Miss., 27.7 miles; extension from Hendon, Miss., across the State Convict Farm, 3.3 miles; Parchman, Miss., to Webb, Miss., 11.7 miles; Helm, Miss., northeast (a lumber spur), 7.9 miles; Stoneville, Miss., east (a lumber spur), 4.1 miles; total, 54.7 miles. For 1907, Holly Bluff, Miss., to Kelso, Miss., 13.3 miles; Philipp, Miss., to Charleston, Miss., 27.6 miles; Etters, Tenn., to Lakeview, Miss., 6.7 miles; Leland, Miss., southwest, 10.8 miles; total, 58.4 miles.
Indian Creek & Pound River—Pound to Haddonfield, Va., 3 miles; Pound to Bold Camp, 5 miles; total, 8 miles.
Interstate—Blackwood to Kellyview, Va., 3 miles; Kellyview to Roaring Fork, 4½ miles; Kellyview toward Appalachia, 1 mile; Osaka to Roda, Va., 1 mile; total, 9½ miles.
Kanawha & West Virginia—Blue Creek, W. Va., to Charleston, W. Va., 14 miles.
Kansas City, Mexico & Orient—South Canadian river to Foley, Okla., 14 miles; Ewing to Clinton, Okla., 3 miles; Rule, Texas, to Knox City, Texas, 17 miles; total, 34 miles. For 1907, Clinton to Knox City, Texas, 152 miles, grading now being completed; Sweetwater, Texas, to San Angelo, Texas, 75 miles, the grading of which is completed; total, 227 miles. The company has also built 33 miles of line in Mexico during the past year, and proposes to build next year about 117 miles of line, which is now partially graded in that country.
Kentucky & Tennessee—Yamacraw, Ky., to Oz, Ky., 7 miles.
Kentucky Valley—Whentcroft to Providence, Ky., 10 miles.
Kentwood & Eastern—Kentwood to Bolivar, La., 11 miles.
Lewisburg & Ronceverte Electric—Lewisburg to Ronceverte, W. Va., 5 miles.
Lexington & Interurban—Versailles, Ky., to Frankfort, Ky., 12 miles.
Liberty - White - McComb to Holmesville, Miss., 8½ miles. For 1907, extension from Holmesville northeast.
Little River—For 1907, extension of 15 miles from The Forks to Jake's Creek in Blount county, Tennessee.
Louisiana & Arkansas—Packton to Tloga, La., 30 miles. For 1907, Tloga to Pineville, opposite Alexandria, La., about 5 miles.
Louisiana East & West—Bunkle to Eunice, La., 37 miles. For 1907, Eunice to Jennings, La., 25 miles.
Louisiana & Nickle Plate—About 8 miles built during the past year. For 1907, about 5 miles; near Shreveport, La.
Louisiana Railway & Navigation Co.—Completion of line to New Orleans, La., 34 miles.
Louisville & Eastern—Beards to Lagrange, Ky., 10 miles. For 1907, Beechwood, Ky., toward Shelbyville, Ky., 23 miles.
Louisville & Nashville—On Cumberland Valley division branch along left fork of Straight creek, 2.45 miles; near Pineville, Ky.; this to be completed in 1907, 1.45 miles; Major branch extension, 2.20 miles, from a point near Olcott, Ky., on the Chenoa branch of Cumberland River & Tennessee; spur from Yolande, Ala., 1.12 miles; on the Atlanta division, Crandall, Ga., to Junta, Ga., 51.2 miles; spur from Crandall, Ga., to Alaculay, Ga., 1.20 miles; Maryville spur from Armona, Tenn., to Maryville, Tenn., 3.90 miles; Crooked Fork spur from Kilsyth, Tenn., to Roosevelt, Tenn., 1.60 miles. For 1907, the Pine Mountain Railroad, Williamsburg, Ky., to Trace Branch, Ky., 22.60 miles; Skelton Creek extension, Vulcan, Ala., to Skelton Creek, Ala., 13.70 miles; spur from Vulcan to mines, 2.40 miles; branch from a point near Helena, Ala., to coal mines, 6 miles; spur from Gadsden, Ala., 1½ miles; extension of the Hogland branch near Coaldale, Ala., 1.88 miles. Total new line laid in 1906, not including revision of line, 63.67 miles. For 1907, 49.53 miles.
Lunenburg Lumber Co.—Extension of 4 miles near Meherin, Va.
Madisonville, Hartford & Eastern—For 1907, Madisonville, Ky., via Hartford, to Mitchell, Ky., 55½ miles, now under construction.
Mangham & Northeastern—Mangham to Baskington, La., 3 miles. For 1907, 3 miles.
Memphis, Paris & Gulf—For 1907, Nashville, Ark., to Ashdown, Ark., 28 miles; about 10 miles of grade now done.
Midland Valley—Pawhuska, O. T., to Silverdale, Kan., 54 miles; about 45 miles in Oklahoma.
Mill Creek & Little River—Bryant's Spur, La., toward Little river, 7 miles.
Minden East & West—Minden to Melrose, La., 5 miles. For 1907, extension toward Shreveport, 3 miles.
Miona Springs—For 1907, Fort Valley, Ga., via Miona Springs, to Southland, Ga., 30 miles; under construction.
Mississippi Central—Pearl River to Brookhaven, Miss., 22 miles; Hattiesburg south, 10 miles; total, 32 miles. For 1907, Brookhaven to Natchez, Miss., 66 miles, of which 45½ miles are under construction; also continuation of line south from Hattiesburg, 15 miles; total, 81 miles.
Mississippi Eastern—Junction City to Camps, 3 miles. For 1907, a further extension of 14 miles.
Missouri & North Arkansas (formerly St. Louis & North Arkansas)—For 1907, extension from Leslie, Ark., to Pangburn, Ark., 75 miles.
Missouri, Oklahoma & Gulf—For 1907, Dustin, I. T., to Calvin, I. T., 25 miles.
Missouri Pacific—Eudora, Ark., to Calvit, La., 37½ miles, this being on the Eudora and Gilbert branch; on the Gurdon & Fort Smith and the Gurdon & Fort Smith Northern, from a point on the Arkansas Southwestern half a mile east of Antolne, Ark., to a point near Black Springs, Ark., 40 miles; on the Springfield Southwestern from Crane, Mo., to Springfield, Mo., 34½ miles; total, 112 miles. For 1907, completion of the Eudora and Gilbert branch to Gilbert, La., about 52 miles. Further construction is also proposed on the Gurdon & Fort Smith line.
Mobile & Western—Mann, Ala., to Union Church, 14 miles. For 1907, extension in Mississippi.
Morehead & North Fork—Morehead to Pargonn, Ky., 12 miles.
Morganfield & Atlanta—For 1907, Morganfield to Providence, Ky., 30 miles.
Morgantown & Kingwood—Kingwood to Rowlesburg, W. Va., 18½ miles.
Mountain Central—Natural Bridge, Ky., to Campton, Ky., 14 miles.
Nacogdoches & Southeastern—Hayward to Woden, Texas, 11.2 miles, and from Woden toward Oil City, 2.5 miles; total, 13.7 miles.
Nashville, Chattanooga & St. Louis—Short spurs to mining industries.
Natchez, Columbia & Mobile—Roonville to Loweton, Miss., 5.5 miles; from Loweton to end of track, 1 mile; total, 6.5 miles. For 1907, from end of track to Pearl River, 4 miles.
Nelson & Albemarle—Schuyler, Va., to Rockfish, Va., 5 miles.
New Orleans Belt Line—In the city of New Orleans, 7 miles. For 1907, completion of line, 3 miles.
New Orleans Great Northern—Slidell, La., to a point near Columbia, Miss., 65 miles; from Rio northwest to Franklinton, La., 21 miles; total, 86 miles. For 1907, Franklinton, La., to Tylertown, Miss., 20 miles; from near Columbia to Jackson, Miss., 85 miles; total, 105 miles.
New Orleans, Natalbany & Natchez—Mount Peller, La., to Hog Branch, 3¼ miles. For 1907, from Hog Branch to Pine Grove, La., 5 miles, with branches for lumbering.
New River, Holston & Western—Penvir, Va., to Day, Va., 6 miles.
Norfolk & Western—On the Inager & Southern Railway from Iaeger to Perryville, W. Va., and coal mines, 30 miles; on the Pocahontas & Western from Pocahontas, W. Va., 3.7 miles; on the Speedwell extension, Cripple Creek to Speedwell, Va., 5.5 miles; on the Blackstone & Lunenburg from Blackstone, Va., 6 miles; total, 45.2 miles. For 1907, extension of the Big Stony, 29 miles into Potts Creek valley, West Virginia; also detour line around Lynchburg, Va., 22 miles, from Forest to Concord, Va.; total, 51 miles.
North & South Texas—From Groveton, Texas, 3 miles. For 1907, continuation of line, 4 miles being graded.
Northampton & Hertford—Gumberry, N. C., to Jackson, N. C., 9 miles. For 1907, extension of 36 miles to Pleasant Hill and the Chowan river. This line is owned by the Westcott & Trenchard Lumber Co.
Northeast Texas—For 1907, extension to connect with the Missouri, Kansas & Texas from Munz to either Daingerfield, Hughes Springs or Pittsburg, Texas, 20 to 30 miles.
Ocilla & Valdosta—For 1907, extension from Ocilla, Ga., to Alapaha, Ga., 17 miles.
Oklahoma Central—Lehigh toward Chickasha, I. T., 30 miles. For 1907, continuation of line, perhaps 100 miles.
Opelousas, Gulf & Northeastern—Melville, La., via Williamson, to Opelousas, La., 24 miles.
Orange & Northwestern—Extension to Newton, Texas, completed, 19 miles.
Pecos & Northern Texas—Canyon City to Plainview, Texas, 57 miles.
Pella Northern—Extension of about 2 miles. For 1907, extension of 2 miles, all in Garland county, Arkansas.
Pineville & Northern—For 1907, Monett to Pineville, Mo., 40 miles.
Plant City, Arcadia & Gulf—Keysville, Fla., to phosphate plant at Nickolds, 7.1 miles. For 1907, 10 miles southeast to Chicora, Fla.
Prescott & Northwestern—Extension Norval to Helbig, Ark., 5 miles. For 1907, extension to Daisy, 6 miles; also from a point on the Gurdon & Fort Smith, Resborough to Kirby, Ark., 8 miles; total, 14 miles.
Raleigh & Pamlico Sound—From Pamlico Junction near Raleigh to Zebulon, N. C., 22½ miles; Newbern, N. C., to Chocowinity, N. C., 33 miles; Washington, N. C., to Chocowinity, 3½ miles; total, 59 miles. For 1907, Zebulon to Chocowinity, 75 miles; Oriental to Bayboro, N. C., 11 miles; Snow Hill to Farmville, N. C., 10 miles; total, 96 miles. Several other extensions are contemplated.
Raleigh & Southport—Lillington to Fayetteville, N. C., 29 miles.
Richmond & Chesapeake Bay—Ashland, Va., toward Richmond, 9 miles. For 1907, to complete the line to Richmond, 6 miles.
W. M. Ritter Lumber Co.—Elizabethton to Hampton, Tenn., and Tiger Creek, 12 miles.
Rogers Southwestern—Rogers, Ark., to Springtown, Ark., 22 miles. For 1907, Springtown to Siloam Springs, Ark., 10 miles.
Roscoe, Snyder & Pacific—For 1907, 30 miles of line from Roscoe, Texas.
St. Marys, Waycross & Nashville—St. Marys, Ga., to Kingsland, Ga., 5 miles. For 1907, continuation of line probably 30 miles.
St. Louis & San Francisco—The Winkler branch from Winkler, Mo., to De Camp, Mo., 6.5 miles.
St. Louis, Brownsville & Mexico—From a point near Brazoria to Bay City, Texas, 26 miles, completing the line.
St. Louis Southwestern—Chickasawba to Blytheville, Ark., 2½ miles; also two spurs of 2½ miles each in Texas; total, 7½ miles.
Sable & Northern—Smyth Junction, La., to

Blewett, La.; also spur to Juanita, La., 20 miles.

Saluda Valley (formerly Greenville & Knoxville)—Greenville, S. C., to Montague, S. C., 6 miles. For 1907, completion of line to Marietta, S. C., 15 miles.

Savage River—Bond, Md., on the Baltimore & Ohio, to a point beyond Gregg's Mill, 5 miles.

Seaboard Air Line—On the Tallahassee, Perry & Southeastern (formerly the Tallahassee Southeastern) from Wacissa, Fla., to the Econfinna river, 19 miles; on the Plant City, Arcadia & Gulf, 5 miles; on the Florida West Shore from Manatee, Fla., to Bradenton, Fla., 1 1/2 miles; also spur from Oatchie, Ala., to mines, 4 1/2 miles. For 1907, in South Carolina, 11 miles to connect the Catawba Valley and Harmony Junction; also on the Tallahassee, Perry & Southeastern from the Econfinna river to Perry, Fla., 12 miles; total, 23 miles.

Sebastian Electrical Co.—For 1907, from Fort Smith, Ark., to mining towns, 45 miles.

Shawnee & Tecumseh Electric—Five miles in Oklahoma.

Shreveport, Alexandria & Southwestern System—On the Louisiana & Pacific, Ramsey to Banks, La., 3 miles. For 1907, to complete line, 16 miles.

Shreveport & Northeastern—From Shreveport, La., 20 miles. For 1907, continuation of line to Homer, La., about 30 miles.

Shreveport, Houston & Gulf—Prestridge, Texas, to Manning, Texas, 9 miles.

Sligo Furnace—Dillard, Mo., to Bixby, Mo., 10 miles.

Snowbird Valley—Andrews to Snowbird, N. C., 13 1/2 miles. For 1907, Wahneta branch, 5 miles.

South & Western—Spruce Pine, N. C., to Altapass, N. C., 4 miles. For 1907, from Fink, Va., to Johnson City, Tenn., 75 miles, and from Altapass to Bostic, N. C., 56 miles; total, 132 miles.

Southern Pacific System—On the Galveston, Harrisburg & San Antonio, Stockdale to Cuero, Texas, 46.85 miles; Gulf Junction to Martinez, Texas, 2.65 miles; on Morgan's Louisiana & Texas, Arnaudville, La., to Port Barre, La., 12.25 miles; total, 61.75 miles. The following are under construction, to be completed in 1907: On the Galveston, Harrisburg & San Antonio, Alleyton-Columbus cutoff, 3.18 miles; on the Glidden-Lorine cutoff, 3.63 miles, the rail laid on the latter being 1.39 miles; on the Louisiana Western, Eunice, La., to Mamou, La., 16.70 miles; on Morgan's Louisiana & Texas, Lafayette to Baton Rouge, La., 52.56 miles, with 15.13 miles of track laid; Bayou Sale to Southbend, La., 10.63 miles. Total track laid in 1906, 78.77 miles; track to be laid in 1907, 71.57 miles.

Southern Railway System—On the Cumberland Railway from Hyde, Tenn., to a point on Clear Fork in Kentucky, 10.8 miles; on the Delta Southern, Elizabeth, Miss., to Napanee, Miss., 6.06 miles; Percy to Richey, Miss., 10.56 miles; Itabena to Belzoni, Miss., 26.80 miles; on the Ensley Southern in Alabama, spur from Cymbing branch to mines of the Tutwiler Coal Co., .8 mile; on the Nashville & Mississippi Delta, Vardaman to Calhoun City, Miss., 8.2 miles; on the Southern, Mobile Junction to North Bessemer, Ala., 3.3 miles; Oakman, Ala., to the Atlas coal mines, 2.4 miles; Davis mines, Alabama, to Pratt coal mine, .7 mile; extension of Ware Shoals spur in South Carolina, 1.7 miles; extension of Flat Top spur to mines near Village Creek, Ala., 4 miles; spur from Oley City, Tenn., to Oley River Coal Co.'s mines, .7 mile; total, 76.02 miles, not including second track.

Spartanburg Electric Power Co.—From the main line of the Southern near Blacksburg, S. C., to Gaston Shoals, 4 miles.

Sullivan-Sanford Lumber Co.—For 1907, Naples, Texas, toward Clarksville, Texas, 15 miles.

Sumter & Choctaw—Bellamy, Ala., to Whitefield, Ala., about 8 miles.

Sylacauga & Wetumpka—Near Hollins, Ala., 2 miles.

Tallulah Falls—Dillards, Ga., to Franklin, N. C., 16 miles.

Tampa Northern—From Tampa northward, 5 miles. For 1907, continuation of line to Brooksville, Fla., 45 miles.

Tatum Lumber Co.—From Hattiesburg, Miss., 2 1/2 miles.

Tellico River Lumber Co.—Tellico Plains, Tenn., to the mouth of Turkey creek on the Tellico river, 10 miles.

Tennessee & North Carolina—Waterville, N. C., to Mount Sterling, N. C., 2 miles.

Tennessee—On New river in Tennessee from Montgomery Fork to Beach Fork, 12 miles; also 8 miles up Smoky creek; total, 20 miles. For 1907, about 20 miles more. This road connects with the Queen & Crescent

at Oneida, Tenn., and now has 28 miles in operation.

Texas Central—Stamford, Texas, to Rotan, Texas, 42 miles.

Texas City Terminal—Texas City Junction to connect with the Santa Fe near Hitchcock, Texas, 2.3 miles.

Texas, Oklahoma & Northwestern—For 1907, Weatherford to Taloga, Okla., 46 miles.

Texas (now the Port O'Connor, Rio Grande & Northern)—For 1907, from Victoria to Port O'Connor, Texas, 90 miles.

Texas Short Line—For 1907, extension proposed from Grand Saline to Canton, Texas, 13 miles.

Texas Southeastern—Diboll, Texas, to Bliz, Texas, 15 miles. For 1907, Vair to Lufkin, Texas, 10 miles.

Texas Traction Co.—For 1907, Dallas to Sherman, Texas, 60 miles, now under construction; construction soon to begin by the Central Texas Traction Co., owned by the same parties, on line from Dallas via Waxahatchie and Ennis to Corsicana, Texas, 65 miles.

Thornton & Alexandria—Calhoun to Hampton, Ark., 4 miles.

Tidewater—Sewell's Point, Va., to a point near Dolphin, Va., 100 miles; on the Deepwater division, Jenny's Gap, W. Va., to Micajah, W. Va., 26 miles; total, 126 miles. For 1907, from Dolphin, Va., to the West Virginia boundary, 232 miles; on the Deepwater division from Micajah, W. Va., to the Virginia boundary, 41 miles; total, 273 miles.

Tombigbee Valley—Extension from Millry, Ala., northward, 15 miles. For 1907, continuation of line 18 miles farther to Butler, Ala.

Town Creek Railroad & Lumber Co.—From Navassa, N. C., toward Town Creek, N. C., 1 mile. For 1907, completion of line.

Tremont & Gulf—Turpentine to Pyburn Junction, La., 20 miles; Jonesboro branch, 14 miles; Pyburn branch, 10 miles; Pyburn Junction to Winnfield, La., 4 miles; total, 48 miles.

Trinity & Brazos Valley—Mexico to Houston, Texas, 157 miles; Teague to Waxahatchie, Texas, 67 miles; total, 224 miles.

Trinity Valley & Northern—Dayton, Texas, to a connection with the Beaumont, Sour Lake & Western, 5 miles. For 1907, 5 miles additional under construction.

Virginia & Carolina Coast—Mackey's Ferry, N. C., to Columbia, N. C., 23.5 miles.

Virginia & Southwestern—For 1907, on the Holston River Railway from a point on the Southern Railway near Persia, Tenn., to the Virginia boundary, 31.5 miles, connecting there with a spur built by the Virginia & Southwestern from Moccasin Gap, Va., 6 miles; total, 37 1/2 miles.

Virginia-Carolina—On the Virginia, Carolina & Southern from Taylor's Valley, Va., to Azen, Va., all in Washington county, 6 miles.

Warren & Ouachita Valley—Glynn, Ark., to Banks, Ark., 4 miles, connecting with the Rock Island.

Washington, Baltimore & Annapolis Electric—From Odenton, Md., 15 miles. For 1907, completion of line northward to Baltimore and southward to Washington, 25 miles. All this is double-tracking for 40 miles, making practically 80 miles of single-track line.

Washington, Frederick & Gettysburg—Frederick, Md., to Lewistown, Md., 9 1/2 miles, which may be extended 7 miles farther to Thurmont, Md., before the end of the year.

Weatherford, Mineral Wells & Northwestern—For 1907, extension of 25 miles north-west from Mineral Wells, Texas.

Webb City & Northern (one of the lines of the Southwest Missouri Railway)—Webb City, Mo., to Purcell, Mo., 10 miles.

W. Denny & Co.'s Lumber Railroad—Big Point to Hurley, Miss., 4 miles. For 1907, Hurley to Donovan, Miss., 18 miles.

Wellsburg & Bethany Electric—Wellsburg, W. Va., toward Bethany, W. Va., 5 miles. For 1907, to complete the line to Bethany, 2 miles.

West Virginia Midland—Webster Springs to Camden, W. Va., 6 miles. For 1907, Webster Springs to Leatherwood, W. Va., 11 miles.

West Virginia Northern—For 1907, extension to Kingwood, W. Va., 1 mile.

Wichita Falls & Northwestern—For 1907, from Wichita Falls, Texas, northward, 25 miles.

Wichita Falls & Oklahoma—Wichita Falls, Texas, to Byars, I. T., 23 1/2 miles.

Wichita Valley—Seymour to Stamford, Texas, 61.3 miles, which will form a complete road from Stamford to Abilene, 38.3 miles, with the Abilene & Northern, which see.

Woodville—Extension from Shaw, Fla., to Lavender, Fla., 2 1/2 miles.

Natural-Gas Development in Kentucky.

[Special Correspondence Manufacturers' Record.]

Lexington, Ky., December 24.

In the development of Kentucky's natural-gas resources a great deal of local, Northern and Eastern capital is now being invested. The possibilities of the extensive gas belts recently drilled are beginning to be realized, and in several sections of Southern, Northern and Eastern Kentucky companies have lately been organized for the installation of natural-gas systems in cities and towns contiguous to developments. Several pools have already been definitely established. These extend over a wide area, and are now centers of a large amount of development work. In some sections the initial attempts are being made at developing natural gas in sufficient quantities to make its utilization practicable as an investment, and in other sections preparations are now being made for extended tests in drilling.

During the past year some extensive projects looking to the utilization of gas wells already drilled have materialized. In the Menifee county field the Central Kentucky Natural Gas Co. early in the year acquired a large acreage and constructed an 80-mile pipe line from the field to this city. Branch lines were extended to Winchester and Mt. Sterling, and with the completion of this system of pipe lines the first attempt at utilizing natural gas on a large scale was begun. The output of the Menifee county wells is now used in Lexington, Winchester and Mt. Sterling, and plans are being considered for extending branch lines to other Central Kentucky cities. The building of lines to the three cities where the gas is now in use and the drilling of wells involved the expenditure of \$1,000,000. The main line from Menifee county to this city is constructed of 10-inch piping, while six-inch piping is used in the branch lines. Altogether 26 gassers have been drilled, and these have an aggregate production of several million cubic feet daily. The natural pressure is sufficient to force the gas to points of consumption without pumping.

The Menifee county gas fields, the most extensive in the State or in the South, were developed by the Standard Oil Co. two years ago. In the Central Kentucky Natural Gas Co., which has headquarters in this city, several Standard Oil people are directors. This gas company acquired the holdings of the Standard.

Following the successful developments for gas in Menifee county, work has been undertaken on a smaller scale in other sections of Kentucky where this product has been found in fair quantities. In Wolfe county a small field has been developed by the Campton Fuel & Light Co., Campton, Ky. The output of the wells is now being used for fuel and light in Campton. While the Wolfe county pool as now developed is small in extent, gas has been found over an extended area, and the coming year will witness a drilling campaign in other sections of the county. The Central Kentucky Natural Gas Co. will endeavor to extend the producing area of its Menifee belt toward Wolfe county, and the tests of this concern will also be extended to Morgan county, another section where gas has been found.

During the past few months extensive natural-gas developments have occurred in the southeastern section of Kentucky. Late in the current year the Knox county belt was entered by Pennsylvania capitalists, and a prolific field near Barbourville was acquired. The Cumberland Gas Co., Barbourville, Ky., was organized and a pipe line extended to Barbourville. Mains have now been laid in that city, and by the first of the year a complete

system will be in operation. Behind the Cumberland Gas Co. is W. C. Kennedy & Co. of Bradford, Pa. This concern holds gas franchises in a number of the largest cities in the country. The territory from which the supply is obtained for Barbourville is only a mile and a half from the city limits. What is regarded as the best natural gasser yet developed in Kentucky has been drilled on the holdings, and other wells will be drilled. Several hundred acres of leases have been obtained, and developments will be extended during the coming year. The well already drilled has a daily production of 300,000 cubic feet, with a natural pressure of 320 pounds.

In Clay county, adjoining Knox, the Burning Springs Natural Gas Co. has been organized by Pennsylvania capitalists. The big gas wells of the Burning Springs section have been purchased, and during the coming year the product will be piped to surrounding points. No plans have yet been taken.

A new section of Kentucky is now being drilled for natural gas. In Warren county, in Western Kentucky, the Bowling Green Oil & Gas Co., Bowling Green, Ky., has commenced drilling for gas near Bowling Green, and when a sufficient supply is obtained the product will be piped to that city. One gasser has already been drilled, and other wells are now going down. This is one of the newest concerns in the Kentucky fields. In Hart county, adjoining Warren, the Hart Clay, Oil & Mineral Co. has drilled several wells, which show gas in fair quantities, and further developments will occur during the coming year.

In Meade county, on the Ohio river, and in one or two counties bordering the Big Sandy river, in Eastern Kentucky, natural gas is now being utilized in nearby towns and cities.

Although natural gas has been discovered in over 50 counties in Kentucky, the development of this resource of nature is as yet in its infancy. Its development heretofore has been merely incidental to the development of crude oil, and its potentialities until the past year have been scarcely realized. Gas has been found in abundance from the Ohio river to the Tennessee line, and from the Big Sandy river, in Eastern Kentucky, to the central part of the State. Wherever oil has been found natural gas has, with few exceptions, been discovered, and in quantities sufficient to make its utilization successful from a commercial standpoint. Heretofore in many sections gas has been discovered, but has been abandoned because of its uncertain quantity. It has now been fully demonstrated that the flow is lasting, and with the expenditure of several million dollars during the past year in its utilization the time is not far distant when many cities and towns in an area embracing two-thirds of the State will enjoy the advantages of natural gas.

W. S. HUDSON.

Seeking Location for Industries.

The MANUFACTURERS' RECORD has received a letter from a New York capitalist who is seeking a location in the South for several industrial enterprises which he contemplates establishing. He has in view especially an ice-manufacturing plant and an electric-light plant. Associations interested in promoting the industrial advancement of their cities and surrounding territory are advised to investigate. Letters addressed to L. H., care of the MANUFACTURERS' RECORD, will be forwarded.

Immigration: A Necessity, Not a Theory.*

By CAPT. J. F. MERRY,
General Immigration Agent Illinois Central Railroad.

In discussing the affirmative of this question, "Immigration to Mississippi a Necessity, Not a Theory," I am not unmindful of the fact that some of the strong newspapers and a number of distinguished citizens of your State have publicly given expression to the pleasant but unpatriotic sentiment, "Mississippi for Mississippians." Representing the Illinois Central and Yazoo & Mississippi Valley Railroad companies, the two largest interests in Mississippi, I most devoutly wish that the material conditions throughout this Commonwealth were such as to warrant the withholding of every uncultivated acre of land and the establishment of future industries entirely to the generations of Mississippians yet unborn. But no matter how dearly we may love Mississippi, nor how gladly would we have only her sons and daughters occupy this goodly land, we are forced to the conclusion that such a thing is impossible, and the only wonder is that a State with such marvelous possibilities has so long remained only partially developed.

Mississippi has, in round numbers, an area of 28,000,000 acres of cultivable lands, much of which is composed of the best alluvial soil, adapted to the successful cultivation of two of the world's staple crops—cotton and corn. We have within the borders of Mississippi sufficient raw material in forests, in cotton and its by-products, to warrant the immediate establishment of new industries that would employ more laborers than you now have white population within the State. Under such conditions, with only a third of your lands in cultivation, and manufacturing in Mississippi has hardly reached the dignity of a beginning, it becomes the sacred duty of all interested in the State not only to invite and encourage immigration, but we are fully warranted in coming together in convention and discuss methods by which we hope to secure for Mississippi a desirable class of immigrants without regard to the language they speak, who shall assist in the still further development of the State's agricultural, industrial and commercial interests.

For a quarter of a century the Illinois Central Railroad Co. has persistently advertised the possibilities of Mississippi. Annually this company has expended thousands of dollars in publishing pamphlets and circulars concerning this Commonwealth which have been given world-wide distribution. Not less than an average of 50,000 circulars devoted exclusively or in part to Mississippi, are being mailed from my office every month. As a result of this advertising every county and nearly every community throughout the State has received one or more families who have been attracted here by what they have heard or read concerning your resources.

Would those who advocate "Mississippi for Mississippians" have these families removed from the State? Have they not made good citizens and contributed not a little to the increased value of your farms and to the present general prosperity of the State? If Mississippi, like Iowa, had 95 per cent. instead of 25 per cent. of her lands in cultivation, and a sufficient number of industries already established to manufacture your raw material, then I would urge that a Mississippi State Immigration League was entirely unnecessary, and the gentlemen who are here to discuss questions of immigration could expend their energies to far better advantage. But, Mr. Chairman, for a fair discussion

*An address before the Mississippi State Immigration League.

of this, to my mind, important question, we must first know what are the real conditions in Mississippi today. Is it not true that in nearly every county throughout the State there is not at the present time, nor has there been for the past three years, a sufficient number of laborers to carry on easily and successfully the milling, manufacturing and planting operations of your State? For months scarcely a mail has come to my office that did not have mail from citizens of Mississippi complaining of the scarcity of laborers and soliciting our assistance in an effort to secure white tenants from the North, or, if this could not be done, almost invariably they say: "Send us good German or Scandinavian families from Europe." These are not imaginary, but present actual conditions in Mississippi. From my standpoint I see no hope of relief except it be in the introduction of industrious foreign immigrants who will make this their adopted home.

It is hardly worth while to discuss the reasons why Mississippi has not today as many farm laborers as in the past. You all understand that many of your negroes now own and operate their little farms, and that many of the young negroes are now leaving the plantations to engage in other occupations. Forty years ago Chicago was about as far north as the negro cared to locate, and even that nearby city did not attract them in great numbers, but today they are in every city from New Orleans to Winnipeg and from New York to Vancouver, and in certain lines the demand for them at fair wages far exceeds the supply. Every trunk line of railroad throughout the United States now has its standard and tourist Pullman sleepers and dining cars manned exclusively by negroes. These and other occupations of a similar character have attracted the brightest young negroes of the plantations, and there is not a probability of one of them ever returning to the plow. Indeed, I confidently believe this exodus of negroes, not from the cities, understand me, but from the plantations of the South, will increase from year to year until 20, 30, 40, possibly 50, years from now the negroes will not be the cotton and corn growers of Mississippi. With the exception of those who own and operate their places and a comparatively few faithful old families who will live and die on the plantations, no matter how alluring the prospect may be in other directions, the negroes, as a race, who have in the past been your only tillers of the soil, and especially the young men, will become commercial servants of railroads, hotels and other large corporations of the cities, not alone of the South, but of the United States. This is prophecy, by it is prophecy based upon several years' observation and actual conditions as they obtain in Mississippi today.

During the present year hundreds, yes thousands, of acres of the best lands in the world, located in the Yazoo-Mississippi valley, have grown up in weeds for the simple reason that there was no one to cultivate them, and that, too, when every indication pointed to high-priced cotton.

Today, while we are discussing ways and means by which we hope to change these unfortunate plantation labor conditions in Mississippi, there are still hundreds of acres of cotton in your fields that will never be picked on account of the scarcity of negro help that has already left the plantations to become town loafers or have found more congenial occupation than the picking of cotton. Many of your planters are already alarmed as they consider

who is to take the place of negroes as tillers of the soil in Mississippi. There is but one answer to this question. To carry on the industries already established and the plantations of Mississippi now under cultivation we must secure immigration from somewhere—from the Northern States if we can, from foreign countries if we must.

But what can we say to the prompters of new industries that would locate in Mississippi, and to the landowners who would come here to begin operations in opening up new farms and assist in the further development of the State? Must we say to them: "Mississippi has, indeed, wonderful possibilities and great resources, but you will have to go to Texas, Oklahoma or to Canada, where they invite immigration; our gates are closed to every immigrant who speaks other than English, and our motto is 'Mississippi for Mississippians.'"

It has required the persistent efforts of railroad companies and the citizens of Mississippi interested in the development of the State a quarter of a century to turn the tide of immigration from the West and Northwest toward Mississippi, but the influx of Northern homeseekers as yet has been insufficient to keep pace with the demands of labor growing out of your industrial and agricultural developments and the places made vacant by those who have left the State. Every month a few families from the North find their way into Mississippi, but they in nearly every instance at once become owners of a farm, and thus contribute little to satisfy the present demand for farm laborers and farm tenants. If the negroes, our present and for a century past our farm laborers, are purchasing their own farms and are leaving the plantations and there is little prospect of securing ample farm laborers and tenants from the Northern States, what are we to do in order that we may keep up with the twentieth century procession that in all the business activities of all the States is moving forward at a rapid pace? It seems to me that the topic I am discussing might consistently be changed to read: "Foreign Immigration to Mississippi Has Become a Necessity, Not a Theory."

Let us for a moment consider what the results would be if a sufficient number of honest, industrious and economical foreign families could be located in Mississippi to supply every demand of planter, mill man and manufacturer. First of all, there would be a marked change in the general appearance of many a plantation where such families might be located. They have been educated to customs of cleanliness and would have sleepless nights until the unsightly environments were corrected. They know the value of barnyard manure as a fertilizer, and every ounce manufactured on the farm would be applied where it was most needed. They will diversify their crops, the natural and rational method of maintaining or restoring the fertility of your soils.

They have been taught that in order to produce a good crop the best possible preparation of the soil is absolutely essential. They understand that it is hazardous, if not useless, to plant seed that has not been thoroughly tested. They appreciate the fact that good soil, properly prepared and planted with good seed, is not sufficient to insure the harvesting of a good crop, and hence early and late you will find them in the field with the hoe or plow cultivating every hill as if they expected it to yield them good returns. Now watch them when the harvest time comes. No circus or any other attraction has charms for them until the cotton is picked, the hay in the barn, the corn in the crib. They will be found six days in the week enthusiastically devoted to the gathering of their

crops. During the year they will have proved themselves peaceable, law-abiding citizens, who see in the products which they have grown on Mississippi soil indications of a great agricultural State whose productiveness will be more than doubled when they and others of their nationalities shall cultivate the farms of Mississippi. Can our friends detect any signs of menace to the country from the introduction of such foreigners as I have described? Let me say at this point that this is no fancy sketch. It is precisely what has been going on for years in the Western and Northwestern States. In my own county in Iowa I remember at the close of the war a few Bohemian families located in Richard township. They had little money, but they at once rented farms, proved themselves good farmers and soon became the happy owners of a few acres of land. Their children attended the public schools, and soon both children and parents could speak English. I have watched with interest their progress from then till now.

The older members of this Bohemian settlement have gone to their reward, but the younger generations, with larger farms and splendid homes, are among the respected citizens of the county. About the same time a colony of Irish located in another township of this county. They had little money; some were Catholics, others Protestants. Many of them for a few years rented farms, saving a little money each year, which was invested in lands. They were an industrious, frugal people, and today their great white houses and red barns and their herds of cattle and hogs testify to their thrifty habits and their thorough knowledge of agriculture. The young members of the families have in many instances married Americans, and their progeny is known only as Americans, among whom are some of the best business men of our State.

Bremen, another township in the same county, is composed exclusively of Germans. Forty years ago they were all poor. They are without a railroad, and are compelled to haul their farm produce six miles to market, and yet within the past 90 days that settlement of Germans in a country place dedicated a Catholic church that cost \$150,000, one-half of which was subscribed by 15 of these farmers. I doubt if in the United States can be found as many wealthy farmers in the same area as is found in Bremen township, Delaware county, Iowa. But their wealth is not all that recommends them. They are kind and honest, and their children and children's children are citizens of whom any State might be proud.

I have referred to three nationalities who have been for 40 years residents in one county. If you were to be introduced to a half-dozen of the young men from each nationality it would be impossible for you to determine the nationality to which they each belonged, unless, perchance, the Irish should find it impossible to withhold their natural witticisms.

The same might be said of Scandinavians, Hungarians and Italians.

The report of the Commissioner of Immigration shows that during the month of October, 1906, there landed in New York 22,163 Italians, by far the largest number from any one foreign country. For two years Italy has furnished the United States more immigrants than any other nation. I am told that in the mother country a large majority of such immigrants worked upon the farm, receiving for their labors little compensation, with not the remotest thought of ever owning in Italy a farm that they could call their own. When they reach the United States and recall the farming conditions as they left them in Italy, no wonder they at once seek any

kind of labor by which they can earn a sufficient amount of money to furnish the bare necessities of life. The question is: How can these hard-working, money-saving sons of Italy be made to understand that farming in America is wholly unlike that of Italy, and that nowhere in all this broad land have their countrymen made such a marvelous success of farming as in the State of Mississippi?

It has been my duty, as general immigration agent for the Illinois Central and Mississippi Valley Railroad companies, as it has been my great pleasure, to visit the homes of Italians employed as tenants on Mississippi plantations. I have noted the cleanliness of their surroundings, their splendid gardens, and in some instances have been shown the store books in which every family's account was kept, and I declare to you, gentlemen, that an Italian family working only 15 to 20 acres of land on shares would invariably show better net returns than Iowa or Illinois tenants who work 160 acres of land and have invested from \$2000 to \$3000 in horses and farm machinery.

Between New Orleans and Memphis, engaged in some form of agriculture, along the lines of the Illinois Central and Yazoo & Mississippi Valley railroads, are located no less than 1500 Italian families. If these are a fair specimen of Italy's farmers and truck growers, I wish the number might be increased to 15,000 instead of 1500 in the very near future.

They have proved themselves peaceable citizens, excellent farmers, and none of the predictions made by those who were prejudiced against them that they would create political and social disturbances have been verified.

If I understand correctly the object of this meeting, it is to organize an immigration league, through which it is hoped that all industrious white homeseekers of every nationality may be reached, and to them made known the resources and possibilities of Mississippi. Surely a more practical subject has not interested the people of your State in many a day. The Commissioner's report for the month of October shows that there came to the United States during that month 99,974 aliens. Of this number Italy furnished 22,163; Russia and Finland, 16,306; Hungary, 12,979; Austria, 10,466; Norway, Sweden and Denmark, 5296; the German Empire, 4853; England, 5566; Ireland, 4321, and Scotland, 1656. It seems incredible, and yet the fact is borne out by the statement of the Commissioner of Immigration, that of the 77,730 aliens arriving at the port of New York during the month of October, 28,507 located in New York State, 14,549 located in Pennsylvania, 5960 located in Illinois, and but 143 in Mississippi.

How can this be accounted for? Not one of the three States mentioned that received more than 60 per cent. of all the aliens that arrived at the port of New York during the month of October can offer to the home-seeker from abroad anything that promises permanent occupation or a permanent home. All they can or will promise is that they shall have work a part of the time at fair wages. The idea seems to obtain among our Mississippi friends that a large majority of the aliens now finding their way into this country are paupers. Such is not the case, as will be seen by the following reports of the money brought in by immigrants who landed at the port of New York during the month of October, 1906: By Germans, \$355,436; by Italians, \$306,620; by English, \$181,247, and the total sum from all nationalities arriving at New York in the single month was \$1,864,470. Not a bad showing for one month.

In their native land 60 per cent. of these newcomers are farmers, but on their arrival in New York they are content to be common day laborers. Why? Because they do not know that Mississippi and other Southern States are in need of their services on the plantations and in the mills and factories at remunerative wages. They do not know of the opportunities here for purchasing a small piece of land and establishing one of the dearest things any family can have—a home of their own. If the laws of this country would permit us to carry this information across the sea, then we might soon distribute throughout the countries from whence come these shiploads of immigrants literature that would tell of Mississippi and her unparalleled advantages. But for the law regarding contract labor that, although rigid, is, I suppose, necessary, we would cross the Atlantic and, through an interpreter, tell these people of America and the advantages of Mississippi, and perhaps sell them tickets direct to Mississippi points. But, Mr. Chairman, as we can do neither except by State authority, some way must be devised by which Mississippi shall get her just proportion of the thousands of stalwart immigrants who are now landing upon our shores. I confess that the problem is a difficult one, but the necessities of the case should enable us to overcome every obstacle.

First of all, we should extend, in a legitimate way, to the industrious white people of the world a cordial invitation to make Mississippi their home. Secondly, we must, by united and determined action, convince the Commissioner of Immigration, and, if necessary, the Congress of the United States, that the port of New Orleans is to the Gulf States what the port of New York is to the East, and that facilities for the inspection and the proper and speedy handling of immigrants at New Orleans must be not so extensive, but on a par with those at Ellis Island.

For 18 months the question of establishing an immigrant station at the port of New Orleans has been under discussion. Commissioner Sargeant has repeatedly advised the transportation companies and the citizens of New Orleans that the Government would pay a reasonable rental on such a building. The old passenger transfer station of the Southern Pacific Railroad Co. was selected as a convenient site, and it was supposed a station would be there established long ago, but for some reason not known to the public it has not been done, although we were advised only last Friday that a plan for a station at that point had been submitted to Commissioner Sargeant, and by him approved, and that the work on the same should begin immediately. Whether this be true or not we cannot say, but one thing is certain, an immigration station will be established at New Orleans, either at the point mentioned or some other, and that right soon. In connection with the business that calls us together today I am glad to announce that if such a station as I have described is at once established, beginning with the month of April, the Illinois Central Railroad Co. expects to have arrangements with one of the strong steamship lines for monthly sailings from foreign ports direct to the port of New Orleans, which will be of immeasurable advantage to Mississippi.

One of the strong arguments in favor of a New Orleans immigration station is the fact that in Mississippi, Louisiana, Alabama, Tennessee and Arkansas, the five States to be especially accommodated by such a station, there is for sale on easy terms upwards of 80,000,000 acres of splendid lands at prices ranging from \$10 to \$20 per acre, any 40 of which would

furnish a home and a competence for every industrious family that is likely to come to us from beyond the sea.

But, my friends, in our effort to secure foreign immigration we must continue unabated our persistent efforts to advertise Mississippi throughout the East, North and Northwest. The cotton manufacturers of New England must be constantly reminded of the opportunities Mississippi affords for the establishment of cotton manufacturing. The woodworkers of Ohio, New York and other States of the East must not be allowed to forget that the hardwood pine forests of Mississippi are among her valuable assets. The cotton growers of the world must be made familiar with the fact that so fertile is the soil of the Yazoo-Mississippi valley that it is, when fully developed, susceptible of growing half as many bales of cotton as is now produced in the United States. The market gardeners everywhere must be furnished with literature concerning the superior advantages of Mississippi for the growing of vegetables for early Northern markets.

And just so sure as effect follows cause, the continued advertising of the State's resources will keep Mississippi in the very forefront among the States that are now contending so vigorously for industrial, commercial and agricultural supremacy.

But let us not forget that with the introduction of new industries and new enterprises will the demand for labor be proportionately increased, and the fact still further emphasized that desirable immigration is an imperative necessity.

TO SPEND \$30,000,000.

Vast Sum to Go Into Expansion of Birmingham District's Industries.

[Special Cor. Manufacturers' Record.]

Birmingham, Ala., December 24.

Iron is going out this year in a whirl. It is but a few days more and the year is ended. The last days are, as a rule, devoted to stock-taking, overlooking accounts and balancing up business. But little heed is given to buying, even when tempting inducements are offered. Every buyer will give his assent to this statement. Yet this year the Christmas holidays are ignored and precedents have lost their influence, for instead of being dull and listless, the iron market is bordering on activity. And the buying is not by the belated class, nor the class that can never see any legitimate reason for an advance in price, but it is being done by the conservative class of operators who are styled "longhended." Most of them have already covered their requirements for nearby months and are forcing business in the second half of 1907. They are not taking it in homeopathic doses. Some of them are asking for it in quantities greater than the sellers care to supply. There is a reluctance among the conservative element of the sellers to sell iron in large quantity for long delivery with existing conditions of the market. But they are being forced to it. They can't escape it by advancing the price, for the buyers promptly accept the advance, not infrequently to the chagrin of the seller. One seller confessed to sales amounting to 12,000 tons for the third and fourth quarters at \$18 to \$18.50. That was as much as he thought it prudent to chance. Today he could get \$19. Other sellers who longed for a rest from active conditions have had such importunate appeals for iron that to protect their trade they have yielded to conditions and re-entered the market.

So the campaign for the last half of 1907 has opened and is bordering on activity with sales at \$18.50 and \$19, the deliveries being some for last half of 1907, some for equal parts for each third and

fourth quarter, some for third and some for fourth quarter. In frequent cases if the buyer wanted one delivery and was offered another he accepted the amendment because he wanted the iron. "He couldn't get pudding, so he took pie." The amounts sold for this delivery it is difficult to estimate, as a large proportion are withheld. For the second quarter the most prominent seller asks \$20 for No. 1 foundry and \$19.50 for No. 2 foundry, and he is getting those prices. Spot iron can be fairly quoted at \$23. Some was sold as high as \$23.50, and some as low as \$22.50 for No. 2 foundry. Where other grades were included the differences were 50 cents per ton till you reached gray forge. At that grade regularity balked and the price was what buyer would pay.

Our quotations for pipe will need revision, as the demand for it and the firmness of iron have forced an advance. Four and six-inch pipe is now \$34, 8, 10 and 12-inch pipe is now \$33, large sizes are \$32. The pipe companies report the demand as unprecedented for the season. In soil pipe the same report is made, and the figures of last week are again given, with the caution added "it looks higher." In relay rails it is most difficult to fill orders, no matter what are the specifications. Steel rails, 56 to 60, are \$33.50 per gross ton; steel rails, 30 to 40, are \$35. In old material, scrap, etc., the market is firm, and a further advance is talked.

Old iron rails are \$16.

Old iron axles are \$20.

Old steel axles are \$16.50.

Old car wheels, \$18.

No. 1 railroad wrought, \$20.

No. 2 railroad wrought, \$16.50 to \$16.75.

Wrought-iron pipe and flues, \$12.50.

Railroad malleable, \$16.

Steel, \$16.

Malleable casting, \$15.

Soil-pipe castings, \$12.

Cast borings, \$10 to \$10.50.

The past week brought the news of the intended election at the stockholders' meeting January 2 of Mr. J. H. Hoadley to succeed Col. T. G. Bush as president of the Alabama Consolidated Coal & Iron Co., and it is announced that early in January he will assume the duties of the position. Mr. Morris W. Bush will become general manager of all its properties, with headquarters here, and Mr. W. C. Seddon of Baltimore will become a member of the executive committee. Mr. Bush states that they are negotiating with a desirable furnace manager for his services, and are planning for improvements and changes that will shortly be announced. The iron trade will greatly miss the retiring president. Since the announcement of the change in ownership of the Woodstock Coal & Iron Co. there has been great activity in efforts to put the property in active commission at the earliest possible time. After an examination of its condition it is announced that they will be making iron by March 1, 1907, with one of the furnaces. New specifications for work are coming in. They are not as free as they have been, but are lively enough to keep business "on the jump."

In coal conditions are in statu quo, and we are near enough the end of the year to approximate the yearly output, which will be near that of last year, say 12,000,000 tons. The cause of no increase is in the car shortage evil.

The railroads are moving about 60 per cent. of the coal offered them by the commercial operators. There is one exception to this statement, as the Louisville & Nashville Railroad is moving 85 to 90 per cent. of the requirements of the shippers. The price at the tippie holds good at \$1.25 to \$2, with instances of \$2 being paid. But much of the coal being shipped is

contract coal, the price ranging from \$1.25 to \$1.40, Birmingham freight rate.

There is no change in coke, and it is quoted at \$4.50, with good demand.

The Payne-Joubert Company, which was recently established here, report shipments to Porto Rico and say their business with the islands is expanding and their domestic trade has gone far beyond their expectations.

The Kilby Frog & Switch Co. report shipments as far west as California, and to the middle West and Eastern States.

W. H. Hudson, formerly master mechanic Western division Southern Railroad, has been here looking for machinery for a plant to be established at Atlanta for repairing and rebuilding locomotives. Coal and coke are in splendid demand. The supply is not equal to the demand. For run of the mines coal brings from \$1.50 to \$2, and in some cases higher prices prevail.

The immigration question is beginning to excite interest, as the Legislature soon to assemble will be called upon to pass measures in behalf of it. Statistics show some increase in the tide in the immediate past, but it is of slow growth. It is probable that an act will be passed in which there will be incorporated the main features of the South Carolina law. There will also be passed a drastic law for the regulation of freight rates. The railroads will have plenty of opportunity for explanations that do not explain. For instance, a manufacturer told the writer that on articles he manufactured the freight to Panama was 23 cents, while to Montgomery (distant less than 100 miles) it was 24 cents.

As indisputable evidence of our progress in expansion, consider that the license taxes collected have increased from \$80,000 in 1897 to \$257,989 in 1906 in the city of Birmingham. Mr. John W. Gates, in a letter to the president of the Commercial Club, has reiterated some of the good things of his interview in the MANUFACTURERS' RECORD about Birmingham. Among other things, he said that the Tennessee-Republic Company had just begun to spend money in this district, and it had mapped out a policy that would require the expenditure of an amount anywhere from \$30,000,000 to \$40,000,000 in the next few years. He is the bellwether of the flock that believes in "the high behests of fate." He therefore pins his faith to Birmingham and holds to it with bulldog grit. But a few years ago there were quite a number who could see no justification for the optimistic views of these letters as to the steady rise of Birmingham to greatness. But the scales have fallen from their eyes, and now they are all wheel horses in the van of progress. The croakers have all repented, and we now have all as a single unit, with full faith in our destiny and a determination to pull together for the advancement of the general good, on the principle that what is good for the general interests of the many is also beneficial to individual interests.

Just as soon as Congress appropriates the money (say \$1,000,000) to place the proper locks at Squaw Shoals, on the Warrior river, we are assured what we most need and what we must have to become invincible, i. e., an open waterway to the sea. Pittsburg is shipping coal in barges to Panama. What others can do we can do, too, by well-directed effort if we make "a strong pull, a long pull and a pull all together."

J. M. K.

The State Immigration League of Mississippi was organized last week with Messrs. J. T. Savage of Jackson, president; George F. Bauer of Jackson, treasurer, and Fred Muller of McComb City, secretary. A vice-president from each county will be appointed.

CLAYS RIGHT AT HAND.

Bright Prospects of New Industries at Augusta.

[Special Cor. Manufacturers' Record.]
Augusta, Ga., December 24.

A feature of the local commercial and industrial world here this week has been the organization of the Hahn Pottery Co., which was launched Thursday evening last with Messrs. T. R. Hahn and H. R. Cohen at the head of the new concern. The plant is the result of the recent agitation by the Chamber of Commerce in the matter of developing Augusta clay possibilities. The new company will manufacture only rough pottery at first, and will make a specialty of jugs, though flower-pots, jars and churns will also be made. This makes two potteries now for Augusta, and the Georgia-Carolina Pottery turned out its first lot of glazed products Saturday, though it now has on several hundred pieces of material ready for the glazing kiln, which has only recently been established. The Hahn Pottery Co. will have unlimited capital, and \$5000 has already been invested in the work. Developments will settle the additional amounts which will be used, and nothing will be left undone to make the pottery one of the finest in the country if possibilities in the way of clays permit, which it is confidently believed will be the case. The discovery that the city uses about \$50,000 worth of jugs annually was the direct cause of the establishment of the factory, and while the local trade will absorb all the products, the equipment of the firm for shipping the ware is complete. The plant is located on the site of the Excelsior Mattress Co., just across the river, and the Southern Railway has a spur track running on the property. The promoters have already ordered their machinery, purchased a large tract of land with the necessary clays and commenced the construction of buildings. They state that they will be in operation by the first of March next, and will then be in position to supply the local trade. The concern is looked upon as being one of the most promising of Augusta's many new industries.

The cotton men of the Augusta Cotton Exchange and Board of Trade held a banquet at the Bon Air Hotel Saturday night, which was one of the most elaborate affairs ever held in the city. The service of the Bon Air Hotel is recognized as being the very highest in type, and the best that could be obtained was furnished to the cotton men. About 50 guests were present, though there are 66 members of the exchange. The banquet was given in the place of the usual Christmas tree of the exchange, which has become quite an event with the Augusta cotton men.

The cotton season has been very poor in Augusta this fall, and the receipts to date are only 266,337 bales, against 289,329 bales up to Saturday, December 22, 1905. While it would seem that this is not such a material falling off, still the crop has been such a costly one till the cotton factors are making poor collections and all of them are unanimous in declaring that the percentage of loans which must be carried over for another year will be about one-fourth, but the enhanced value of property by which these debts are secured makes them safe. The opinion here concerning the cotton market is very bullish in sentiment, and but little cotton is being sold now.

The Planters' Loan and Savings Bank is constructing a handsome bank building on Broadway right next to the Georgia Railroad's fine oolitic limestone bank building. The cost of the building will probably be about \$25,000, and it will be one of the most modern type. When it is completed there will be three big banks in adjoining buildings—the Georgia Railroad

Bank on the corner, the Planters' Loan and Savings Bank next, then the National Bank of Augusta next—and every one of the buildings are of the highest type.

There are many rumors of railroad construction current, but nothing of a definite nature has yet been announced concerning any of them. However, it is quite certain that active steps will be taken to have new roads to come into Augusta, and the old lines now operating here will improve their service also. The growth of the section and the tremendous increase in traffic, both passenger and freight, makes it impossible for the roads here now to handle the business, and embargoes on certain traffic have been issued by several roads here during the week. In the cotton season the lack of facilities is clearly demonstrated. The new Georgia & Florida Railway Co. will certainly prove a success, as it is authoritatively stated that sufficient capital is at hand to push the construction of the road to a finish, and within a year trains may be operating from here direct to Florida.

J. C. McAULIFFE.

SOUTHERN ENGINEERS.

Features of Their Association's Meeting at Atlanta.

[Special Cor. Manufacturers' Record.]
Atlanta, Ga., December 21.

The very successful eighteenth annual convention of the Engineering Association of the South, held in Atlanta, Ga., last week brings to the notice of the Southern engineers that there is an advance being made in the growth of a society for the benefit of the Southern technical men. The registration in attendance was about 80, and it is particularly interesting because of the fact that the local section was only organized a few months since, and out of the sum of 80 members in attendance, about 40 of them were out-of-town engineers. The Engineering Association of the South has local organizations in the following cities: Nashville, Tenn.; Birmingham, Ala., and Atlanta, Ga., the Nashville being the original one and the last-named having only been organized this fall.

The city of Atlanta is particularly adapted for such conventions for two reasons: First, on account of the numerous large works of construction that are being carried on by the different railroads making their terminus in this city, and secondly, on account of the hospitality and friendly spirit of her people.

The regular business meeting took place at the New Kimball, and announcement was made of the election of the officers for the following year. Mr. Julian Kendrick, City Engineer of Birmingham, was the retiring president, and Mr. A. V. Gude of the city of Atlanta was elected president of the association. This was particularly fitting, as Mr. Gude was not only the oldest member present of the Atlanta chapter, but was one of the charter members of the original association. The usual routine of business was gone through, and especial attention was brought to bear upon the fact that the life of an organization of this character depends in a large measure upon its publications and proceedings. The secretary, Mr. H. M. Jones, to whom much credit is due for the present society publication, desires that more attention be given to the production of papers by the members. It is a fact that the majority of members of an engineering association do not have an opportunity of attending meetings; consequently, they depend upon the publications for their information and the good they receive for their annual dues. Afterwards a great many points of interest to the local engineers were brought up and discussed.

The association in special cars visited the following works of engineering importance in Atlanta: The Atlanta city water-

works, pumping and filtering station, Atlanta Steel Hoop Co.'s new rolling mills and wire-nail plant, the new terminal station, Nelson-street reinforced concrete viaduct, the new Louisville & Nashville reinforced concrete terminal station and the Washington-street reinforced concrete viaduct. In Atlanta there is something like 50,000 yards of concrete being used at the present time in reinforced concrete construction, and particularly interesting among these structures is the new Louisville & Nashville freight station being built by the Cincinnati Ferro-Concrete Co. This building is 50 feet wide, 835 feet long and five stories high, being composed of entirely reinforced concrete.

The social features of the association included an elegant banquet served in the banquet-room of the New Kimball, among the speakers and noted guests present being Mr. H. A. Parker, who was for a number of years chief engineer of the Rock Island system; Mr. Hunter McDonald, chief engineer of the Nashville, Chattanooga & St. Louis Railroad; Mr. Julian Kendrick, City Engineer of Birmingham; Mr. J. L. Ludlow, consulting municipal engineer from Winston-Salem, N. C., and others. The social side was prominent, and it was impressed on each and every engineer that to establish and maintain an engineering association that will be for the good of technical men friendship among them must be maintained, or, in other words, they must know something of each other, the work they are doing, and be benefited by the experience of others.

Atlanta's new section will prove to be one of the best in the organization, as there are scores of men engaged in the engineering work in this city who attended this convention expressed themselves as being determined hereafter to be "among those present."

P. H. NORCROSS,

Associate Member American

Society Civil Engineers.

Good Location for Cannery.

Referring to a proposed cannery for Denison, Texas, T. W. Larkin, secretary of the Denison Board of Trade, writes the MANUFACTURERS' RECORD as follows:

"We have not yet arranged for the establishment of the plant, but we are trying to interest someone with some capital and plenty of ability to take charge of the business. Our people are deeply impressed with the need of a cannery factory and are willing to subscribe liberally for stock in a company if one can be organized.

"It is a golden opportunity for a live operator. Our lands are ideally adapted to growing canning crops and our farmers are eager for an opportunity to produce such crops instead of the ordinary field crops, which are the least profitable. We have wholesale houses that are large distributors of canned goods, and they are now having to import from distant States to supply their Texas trade; they would likely consume the entire output of a factory located here.

"If you can put us in touch with someone seeking such a location the favor will be fully appreciated."

A Southern Building Proposition.

It is claimed there is an exceptional opportunity at Clarksville, Tenn., for the erection of a modern combined office and apartment building. The Chamber of Commerce has been endeavoring to interest capitalists in this, and states that not more than \$50,000 need be invested. It is believed every room could be leased before the building is completed. Interested parties can address Earle M. Cary, secretary of the Chamber of Commerce, for full detailed information.

RAILROADS

[A complete record of all new railroad building in the South will be found in the Construction Department.]

WORK ON THE B. & O.

Second Track Built, But No New Line Constructed.

The Baltimore & Ohio Railroad Co., so the MANUFACTURERS' RECORD is officially informed, has not built any branches or extensions during the past year. Since January 1 last the company has, however, laid second, third and fourth track as follows:

"Baltimore division, second track between Gaithersburg, Md., and Germantown, Md., 4.19 miles, and second track between Barnesville, Md., and Dickerson, Md., 2.59 miles; Wheeling division, second track at Wheeling, .30 mile, and second track Bridgeport (Ohio) yard, 2.61 miles; Cleveland division, track improvements at Lorain (Ohio) yard, etc., 5.71 miles, and track improvements at Cleveland (Ohio) yard, etc., 19.74 miles; Newark division, third track between Central City, Ohio, and Outville, Ohio, 4 miles, and from Summit to Big Walnut, third track, 5 miles; Connellsville division, first track, relocation of approach to new Fairmont, Morgantown & Pittsburg Railroad bridge, near Fairmont, W. Va., 2.54 miles, and first track on Hickman Run branch, .85 mile; Pittsburg division, third and fourth track between Wheeling Junction and Rankin, Pa., 4.65 miles, and third and fourth track between Braddock, Pa., and Dexter, Pa., .32 mile; New Castle division, second track across Mahoning river bridge, Haselton, Ohio, .31 mile, and second track between Sterling, Ohio, and Nova, Ohio, 7.52 miles; Chicago division, second track between Avilla, Ind., and Cromwell, Ind., 2 miles; Ohio division (B. & O. S. W. R. R.), second track between Madeira, Ohio, and O'Bannon, Ohio, 7.40 miles, and second track from Byers Junction, Ohio, to West Junction, Ohio, 8.10 miles.

"The following number of miles of sidings have also been constructed during the year 1906: Between Gaithersburg and Germantown, .45 mile, and between Barnesville and Dickerson, .85 mile, on the Baltimore division; Pittsburg division, between Wheeling Junction and Rankin, 2.57 miles, and at Braddock, Pa., 1.33 miles; New Castle division, at Haselton, Ohio, .81 mile, and between Sterling, Ohio, and Nova, Ohio, 1.36 miles; Ohio division (B. & O. S. W. R. R.), between Madeira, Ohio, and O'Bannon, Ohio, 1.20 miles, and between Byers Junction, Ohio, and West Junction, Ohio, 1.40 miles."

CHANGED ITS PLANS.

Texas Railway Also Has a New Name—Construction Has Begun.

The Texas Railway Co., chartered several months ago to build a line from Port O'Connor, Texas, to Victoria, San Antonio and other points in that State, has changed its name to the Port O'Connor, Rio Grande & Northern Railway Co. Its proposed main line is changed to extend from Port O'Connor through the counties of Calhoun, Victoria, DeWitt, Gonzales, Guadalupe and Bexar to San Antonio, a distance of 200 miles, touching the towns of Seadrift, Victoria, Yoakum, Gonzales and Seguin. Branches are also proposed thus: From Gonzales to Smithville, through the counties of Gonzales, Fayette, Caldwell and Bastrop, a distance of 50 miles; from Yoakum to Lagrange, through the counties of DeWitt, Lavaca and Fayette, a distance of 61 miles; from a point on the main line 21 miles south of Yoakum, through the counties of Victoria and DeWitt, to Cuero, a distance of 20 miles; from Seguin, through the counties of

Guadalupe and Comal, to New Braunfels, a distance of 17 miles.

The construction contract has been awarded to W. S. Hipp of Houston, Texas, and work has begun at Victoria. The contract calls for the final construction of 265 miles of line, but 90 miles of this consists of an old railroad grade between Port O'Connor and Victoria, which will simply have to be restored. It is said that a London company is financing the plan, which includes the construction of a deep-water harbor at Port O'Connor. Connection will be made with the Missouri, Kansas & Texas Railway at Smithville and with several roads at San Antonio. Part of the construction will be sublet. The work at Port O'Connor will, it is said, include the building of jetties. The water there is now 16 feet on the bar, but it is proposed to make a 30-foot channel.

The officers of the company are Michael Goggan, president; W. I. Allen, first vice-president and general manager; George R. Gillette, second vice-president; August De Zavala, secretary and treasurer; Harris & Gillette, general counsel, all with headquarters in San Antonio, and L. A. Gueringer, chief engineer, and John Sullivan, superintendent of construction, with headquarters in Victoria.

ILLINOIS CENTRAL LINES.

Construction Done in Several States During the Past Year.

Mr. A. S. Baldwin, chief engineer of the Illinois Central Railroad, writes the MANUFACTURERS' RECORD that the company has built during 1906 new track as follows:

"Wickliffe, Ky., to Winford, Ky., 3.9 miles of double track; Woodstock, Tenn., to Leewood, Tenn., 7.5 miles of double track; connection of Illinois Central Railroad freight yard with Mobile & Ohio Railroad at Jackson, Tenn., 3 miles single track; second track from Knoxville to Millington, Tenn., 3.7 miles single track; second track from Manassas to Frenier, La., 14.3 miles single track; total, 32.4 miles.

"During the year the Illinois approach to the Ohio river bridge at Cairo, Ill., has been filled, requiring 710,000 cubic yards of material.

"The following lines are under construction: Zeigler, Ill., to Herrin, Ill., 7.50 miles single track; Atoka, Tenn., to Knoxville, Tenn., 5.50 miles double track; Corinth, Miss., to Haleyville, Ala., 80.23 miles single track; total, 93.23 miles.

"Terminal facilities are being constructed in Birmingham, Ala., consisting of a city yard, a freight house and an outer clearing yard with a connection to the city yard, in all about 60,000 feet of track."

Mr. Baldwin also sends the following information concerning construction on the Yazoo & Mississippi Valley Railroad during 1906:

"Silver City, Miss., to Holly Bluff, Miss., 27.70 miles; extension from Hendon, Miss., across State convict farm, 3.30 miles; Parchman, Miss., to Webb, Miss., 11.70 miles; Helm, Miss., northeasterly (lumber spur), 7.90 miles; Stoneville, Miss., easterly (lumber spur), 4.10 miles; total, 54.70 miles.

"The following lines are under construction and will be completed early in 1907:

"Holly Bluff, Miss., to Kelso, Miss., 13.3 miles; Philipp, Miss., to Charleston, Miss., 27.6 miles; Etters, Tenn., to Lake View, Miss., 6.7 miles; Leland, Miss., southwesterly, 10.08 miles; total, 58.4 miles."

New Equipment.

The Illinois Central Railroad will, it is reported, purchase a number of new locomotives, perhaps 50. The same company is also reported to have ordered 500 box cars.

The Pennsylvania Railroad has requested bids for the construction of 5000 box cars, and it is expected that the contract will be awarded very soon.

The Atlanta, Birmingham & Atlantic Railway has received bids for the construction of 300 coal cars. The company has also ordered from the Baldwin Locomotive Works 25 new engines. A later report says that the car contract has been awarded to the South Atlantic Car & Manufacturing Co. of Waycross, Ga.

The Louisville & Nashville Railroad will, it is reported, build 28 locomotives in its shops at Louisville.

The New Orleans Great Northern Railroad has given an order for 300 flat cars to the Pressed Steel Car Co., all of 80,000 pounds capacity.

The Missouri, Kansas & Texas Railway will, it is reported, let a contract for new freight cars.

The Kansas City, Mexico & Orient Railway is reported to be in the market for 5 locomotives.

The Chesapeake & Ohio Railway's order for locomotives includes 8 Pacific type and 7 Atlantic type.

The Seaboard Air Line will, it is said, build 50 flat cars in its shops at Portsmouth, Va.

The Chicago, Rock Island & Pacific Railway is reported to be receiving bids for 103 box cars, 35 coal cars, 18 stock cars, 3 furniture cars and 3 flat cars.

The Fort Smith & Western Railway has ordered 2 new locomotives and 200 freight cars.

The Nashville, Chattanooga & St. Louis Railroad is having 500 freight cars built by the American Car & Foundry Co.

The Birmingham Railway, Light & Power Co. is receiving a consignment of 24 new cars.

The Central of Georgia Railway has received 8 large passenger engines and 14 freight engines, besides 6 switch engines. It is now receiving 10 large freight engines, 4 of them being delivered. The company also has an order for freight cars to be delivered as soon as possible.

The Chattanooga Railways Co., Chattanooga, Tenn., has ordered 15 new cars, each 40 feet long with a seating capacity of 54 people. They are double-truck cars and are equipped with airbrakes.

The Atlantic Coast Line will purchase 100 locomotives, 3250 freight cars and 50 passenger cars for delivery in 1907. Contracts for 20 of the engines have been awarded, and these are to be delivered in February. The company will also buy 36,300 tons of 85-pound rails. It still has to receive more than 2500 freight cars and 20 locomotives on orders given for delivery in 1906.

KNOXVILLE TO ASHEVILLE.

Rumors That a Railroad May Be Extended to Make Connection.

The Tennessee & North Carolina Railroad, which runs from Newport, Tenn., to Waterville and Mt. Sterling, N. C., 21 miles, will, it is reported, build an extension to Canton, N. C., and also from the other end of Newport to Knoxville, Tenn. There are rumors that the Louisville & Nashville Railroad is back of this movement, although it is said that the Southern Railway may be concerned.

Recently parties interested in the Champion Fiber Co., which is building a large pulp mill at Canton, arranged for the construction of the Pigeon River Railroad from Canton to Sunburst, 17 miles, but it is said that the extension of the Tennessee & North Carolina will cover the route of the proposed independent line and will render its construction unnecessary. The route will be along the Big Pigeon river.

In this connection it is said that the Louisville & Nashville Railroad is prob-

ably interested in the movement, as it desires to enter Asheville, N. C. Both the Southern and the Louisville & Nashville are reported to have been doing considerable engineering work recently around Canton and in adjoining counties.

An officer of the Tennessee & North Carolina Railroad informs the MANUFACTURERS' RECORD that at present there is nothing definitely decided as to any extension. During this year the road was extended only two miles, from Waterville to Mt. Sterling.

Asheville Rapid Transit Plans.

The Asheville Rapid Transit Co. of Asheville, N. C., has been chartered with \$500,000 capital by Charles E. Van Bibber of Malden, Mass., and Thomas S. Rollins and John P. Arthur of Asheville, N. C. This is a result of the purchase of the Loop Line property and Overlook Park by Mr. Van Bibber, who is named as president of the Railways Construction & Securities Co. of New York city. He is described as a civil engineer, and Charles A. Moore, attorney, has applied to the Asheville Board of Aldermen for a franchise to build the railway proposed by the new company. The line will extend from the city to Overlook Park, which will be improved. A report that the new road was backed by one of the trunk lines in the South was denied, and it was further stated that it was not connected with any other steam railway enterprise.

Mr. Moore stated that the company desired to begin work as soon as possible, waiting only upon weather conditions, and upon the arrival of men, materials and machinery at Asheville. It is proposed to build the line as far as the golf links not later than September 1, and to have it all completed during 1907.

The company's charter will permit it to build to any point within 25 miles of Asheville, and it is understood that another line will be constructed to Weaverville, N. C.

May Connect With the Tidewater.

The West Virginia Connecting Railroad, which is projected from Belington, W. Va., to Rogersville, near Waynesburg, Pa., will, it is reported, be connected with the Tidewater Railway on the south. The West Virginia Connecting line is projected by J. V. Thompson of Uniontown, Pa., and D. F. Maroney of Pittsburg, who projected the Uniontown & Wheeling Short Line that is to be built in connection with the Wabash Railroad's eastern extension. Whether the connecting line is also to be a Wabash enterprise does not yet appear, although, according to reports from the region through which it has been surveyed, it will doubtless be practically a part of the system of roads in West Virginia and Southern Pennsylvania projected by Geo. J. Gould, Henry G. Davis, W. S. Pierce, F. S. Landstreet and others interested in the Western Maryland, the Coal & Coke and the West Virginia Central lines.

I. C. to Birmingham.

W. J. Harahan, fourth vice-president of the Illinois Central Railroad, has just paid a visit to Birmingham, Ala., and is reported as saying that the company expects to be operating its trains into that city about May 1 next. He also said that construction is going on as rapidly as possible upon the connecting line, which is being built between Corinth, Miss., and Haleyville, Ala., 80 miles, and the work is nearing completion.

The trains will enter Birmingham over the Northern Alabama Railroad from Haleyville, and Corinth, Miss., at the other end of the connecting link, will be reached over the Mobile & Ohio.

The company will build freight yards at Birmingham with a capacity of 600 cars, which will be increased as may be needed. There will also be a repair shop and an engine-house.

Canadian Valley Building.

For a year or two there has been talk about building a railroad northwest from Oklahoma City, and now, according to a report from that place, the Canadian Valley Railway Co. has completed its preliminary survey and is making a location survey for its line, which is to run from Oklahoma City via Woodward and Watonga, Okla., to Raton, N. M. The final survey has been finished from Raton as far as Woodward, where grading has begun, and the engineers have progressed with their work as far as Watonga. Some grading has also been finished in New Mexico. R. A. Ensign of New York city is the promoter of the road, which was chartered several months ago by F. E. Jennison of New York, Jesse G. Northcutt of Raton, N. M.; B. W. Key, W. P. Halliday and A. M. Appleget of Woodward, Okla.

Car Plant Proposed for Texas.

A dispatch from Houston, Texas, says that it is proposed to establish a large car-manufacturing plant in that city. Edwin F. Goltra of St. Louis, Mo., is named as the promoter of the project, and B. F. Yoakum, John H. Kirby and James Campbell are said to be interested. Mr. Yoakum is the chairman of the Rock Island system, Mr. Kirby is a well-known lumberman of Houston and Mr. Campbell is a resident of St. Louis. It is said that the proposed plant will be an independent concern, and that an iron and steel factory is to be operated in connection with it. The report says that the plant could be kept busy on manufacturing cars for Texas railroads alone.

South & Western Construction.

Reports from Bristol, Tenn., say that the South & Western Railway Co. has abandoned the policy of doing part of its own construction and has now let to contractors the grading for all its extensions. When the company began the extension work it did its own construction, but piece by piece the new work was turned over to various contractors, and it is now all in their hands.

The South & Western, it is said, continues to purchase real estate at Johnson City, Tenn., and has already bought more than \$200,000 worth. Part of this will be used for the terminals of the road and necessary buildings.

Greenville to Knoxville.

The Saluda Valley Railroad, or Greenville & Knoxville Railway, is laying track out of Greenville, S. C., northwest. It is now completed as far as Montague, six miles, and the company has ordered three passenger cars, 10 flat cars and 12 box cars, and it is expected to begin train service as far as the road is finished when this equipment arrives. The road will first be built to Zaconia, N. C., and thence to Knoxville, Tenn. W. T. Patterson of Atlanta, Ga., is president.

Leslie, Pangburn and Helena.

The Missouri & North Arkansas Railroad, formerly known as the St. Louis & North Arkansas, which recently let a contract to build an extension of 75 miles from Leslie, Ark., to Pangburn, Ark., has amended its incorporation articles, providing for a further extension from Pangburn to Helena, Ark., 98 miles, via Searcy and near Higginson, Terry and Brinkley. The estimated cost of this branch is about \$2,500,000.

Railroad Notes.

R. D. T. Hollowell has been appointed commercial agent of the Georgia Southern & Florida Railway Co. at Cincinnati, Ohio.

The Fort Smith & Western Railway proposes to expend considerable money upon the improvement of its line, and will place rock ballast on 30 miles at the west end, the work to begin next spring.

L. Sevier has, it is reported, been appointed second vice-president and traffic manager of the Seaboard Air Line to succeed E. F. Cost, who lately resigned. Mr. Sevier, who is general freight agent of the Alabama Great Southern Railroad at Birmingham, Ala., is to take charge in his new position on January 1.

Mr. Wm. A. House, second vice-president and general manager of the United Railways of Baltimore, has been appointed acting president to fill the vacancy caused by the death of Gen. John M. Hood. Mr. Wm. Early, private secretary to General Hood, has been appointed assistant secretary of the company, and will aid the acting president in matters relating to the president's office.

Another Cement Plant.

The Dewey Portland Cement Co. has commenced the operation of a 2500-barrel cement plant at Dewey, I. T. This location was selected on account of the fine quarries of rock and shale and the abundance of natural gas to be had for fuel, combined with exceptional shipping facilities.

The main buildings will be steel and concrete and will house a plant equipped with the latest machinery in every detail, mechanical and electrical, and will be the result of skilful engineering. Electric power will be used throughout and will be furnished from three-phase electric generators direct connected to four 600-horse-power engines. About 50 motors, aggregating 2500 horse-power, will be installed, it being the purpose of the company to drive each important machine or apparatus by an individual motor; thus, in case of a breakdown, only one machine is out of commission and the production of the plant will be held at a maximum.

Contracts for buildings, power and crushing plants have been signed and contract for the cement machinery is now being placed. The buildings are being manufactured and erected by the Bartlett Steel Co. of Joplin, Mo., in accordance with its own designs. It is expected the entire plant will be in operation by early summer. The company's officers are: F. E. Tyler, president and general manager; F. L. Williamson, vice-president; J. H. Keith, secretary; J. R. Mulvale, treasurer; C. M. Ball, assistant treasurer. Main office at Coffeyville, Kan.

Large Plant for Sherman.

A cottonseed-oil mill of large capacity, to be erected at Sherman, Texas, has been projected by Mr. J. C. Tassey and associates of that city, who have recently organized the Sherman Refining Co. for the purpose of establishing such a plant. The mill will be modern and equipped for a daily capacity of 800 barrels of refined cottonseed oil. The company desires to purchase tank cars, either new or second-hand, of not less than 125 barrels capacity and in good condition. Mr. J. C. Tassey is the general manager in charge of operations.

The executive committee of the Alabama State Immigration Society, of which Mr. F. M. Jackson of Birmingham is president, has called for December 29, at Montgomery, a meeting of the industrial and commercial bodies of the State to consider legislation favorable to immigration.

LUMBER

[A complete record of new mills and building operations in the South will be found in the Construction Department.]

Big Purchase of Hardwood Timber.

Illinois capitalists are reported from Lake Charles, La., as having purchased about 17,000 acres of hardwood timber lands in Calcasieu parish from M. W. Green of Prescott, Ark., who recently acquired the property from the receiver of the Chicago-Texas Land & Lumber Co. The tract is located along the Sabine river in the northern and western parts of the parish, and will greatly augment the Louisiana holdings of the purchasers, who are said to own extensive hardwood properties in Ouachita, Moorehouse and Avoyelles parishes. The consideration is stated at between \$160,000 and \$170,000. Among those mentioned as interested in the deal are Messrs. Scott Matthews of Ouachita parish, Louisiana; W. K. Murphy, Pinckneyville, Ill.; C. B. Cole, Chester, Ill.; John B. Jackson, Havana, Ill., and Judge George W. Wall, DuQuoin, Ill.

Steam Logging Operations.

With reference to the plans of the Chambers Contracting Co. of Macon, Ga., recently organized, the MANUFACTURERS' RECORD is advised that its purpose is to do railroad construction work and steam logging. Its operations for the present are confined to the steam-logging feature of its business, and it has been awarded a logging contract on the Oconee river which, it states, will require several years to complete. To facilitate its work on this contract the company is constructing a railroad seven miles in length, which it will use exclusively in handling logs, these to be hauled to the track and loaded by machinery. It is expected to begin operations about January 15.

Demand for Box Shooks.

Box and box-shook manufacturers of Memphis, Tenn., are reported as having a very active demand for their output and are finding it difficult to secure an adequate supply of cottonwood and other necessary material for their purposes. The demand for tight cooperage material of every kind is very large also, the call for oil-barrel material, both heading and staves, being particularly good and prices high. The shortage of cars is proving a decided inconvenience both to the manufacturers and the trade, as it prevents raw material from coming to the plants and the finished product from going out.

Ready for Operation.

The MANUFACTURERS' RECORD is advised that the Lugoff (S. C.) Hardwood Co.'s plant, which has been under construction for some time, is about ready for operation, and for the present will only solicit orders for short-length dimension stuff suitable for automatic and other lathes, as well as wagon and buggy material. The plant will use oak, ash, hickory, poplar, red gum, black walnut, persimmon and dogwood. It will also make pine laths, and as soon as sufficient dry stock is accumulated will take up other lines.

Big Deal Consummated.

A dispatch from Texarkana, Ark., states that a deal has been consummated there for the purchase of the mill and timber holdings of the Ed Rand Lumber Co. by Texarkana capitalists. The transfer includes a mill at Alexandria, La., having a daily capacity of 125,000 feet, and about 200,000,000 feet of standing timber. The purchasers are Messrs. J. S. Crowell, J. K. Wadley, R. E. Porter, Will Wadley and E. K. Smith. Messrs. J. S.

Crowell and Will Wadley will be the managers of the property.

Yellow Pine Lumber Inspection.

The Heard Lumber Co., Inc., 106 Bay street east, Savannah, Ga., is circulating a very convenient booklet, illustrating and containing the 1905 inspection rules of yellow-pine lumber, as approved in conference of committees of a number of lumber organizations at Savannah, Ga., December 10, 1904, and amended at the New York joint conference, September 12-13, 1905.

Wants Railroad Ties Hewn.

The Lunenburg Lumber Co. of Richmond, Va., wants to contract the hewing of any portion of 200,000 ties in Lunenburg county, Virginia. The timber, it is stated, will cut 35 ties per acre, and the company will pay 14 cents for No. 1 and 10 cents for No. 2 ties, eight feet long.

Company Wants Lumber.

The Jordan Bros. Lumber Co. of Norfolk, Va., is in the market for lumber of all kinds in carload lots.

Lumber Wanted in Texas.

The Houston Showcase Co. of Houston, Texas, wants quotations on pine and hardwood lumber.

Lumber Notes.

The steamer Satilla is loading a cargo of cross-ties at Brunswick, Ga., for a Northern port.

Messrs. Ziegler & Ziegler of Richmond, Texas, are sawing a large shipment of timber for export to Germany.

Parker Brothers' sawmill at Lugoff, S. C., recently destroyed by fire, has been rebuilt and is now in operation, cutting virgin yellow-pine lumber.

The four-masted schooner Setzer cleared from Wilmington, N. C., last week with a cargo of 1,600,017 feet of lumber for New York. The cargo was loaded at the plant of the Cape Fear Lumber Co. and was consigned by Capt. C. D. Maffitt.

Messrs. Godwin & Johnson of Raleigh, N. C., are reported to have received an order for about 750,000 feet of lumber to be used by the Negro Development & Exposition Co. of the United States in its building at the Jamestown Exposition.

The Newhouse Mill & Lumber Co. of Parma, Ark., has been incorporated with a capital stock of \$90,000 by Messrs. Samuel Newhouse, T. S. Estabrook, S. N. Bonner, H. R. Abdill, E. E. Shelle, Joseph H. West, E. Y. English and C. P. Harnwell.

Advantages for a Cement Plant.

The business men active in promoting the industrial progress of Clarksville, Tenn., state that their thriving city needs a cement plant and has at hand all the advantages for such an enterprise. They refer to available furnace slag sufficient for making a thousand barrels of cement daily, limestone in great quantities, plenty of labor, low freight rates, two railroads, and low taxation. Five new manufacturing plants are now being located at Clarksville and others are wanted, including a knitting mill, for which the facilities are attractive. The Chamber of Commerce of Clarksville, Earle M. Cary, secretary, is prepared to send full details of the city's possibilities for manufacturing enterprises of various kinds.

The Chamber of Commerce of Columbia, S. C., has elected Messrs. Willie Jones, president; J. J. Seibels, W. J. Murray and L. B. Dozier, vice-presidents; C. Wardlaw Moorman, secretary, and J. Hamilton Love, treasurer.

TEXTILES

[A complete record of new textile enterprises in the South will be found in the Construction Department.]

Correspondence relating to textile matters, especially to the cotton-mill interests of the South, and items of news about new mills or enlargements, special contracts for goods, market conditions, etc., are invited by the MANUFACTURERS' RECORD. We shall be glad to have such matter at all times, and also to have any general discussion relating to cotton matters.

The New Mississippi Mills.

The Mississippi Mills at Wesson, Miss., will be taken over and continued in operation by the New Mississippi Mills, which company has been organized during the past week with a capital stock of \$500,000 and a bond issue of \$360,000. The new company's officers are: President, John H. Fulton; vice-president, R. M. Walmsley; secretary-treasurer, Albert Baldwin, Jr.; they and Messrs. R. E. Craig, Maurice Stern, George W. Nott and R. W. Millsaps are the directors, all of New Orleans, La. The plant has a modern equipment of 16,496 spindles and 611 looms for cotton, 8400 spindles and 220 looms for wool. It was bought in recently by Maurice Stern for \$300,000, he representing the bondholders.

Later it is announced the company has sold the plant to the Lane-Maginnis Mills Corporation of New Orleans, and this company has increased its capital stock from \$1,600,000 to \$2,000,000. The stockholders will meet on January 8 to choose officers and directors and a title for the consolidated enterprises. It will probably be the Textile Mills Corporation, and will operate approximately 110,000 spindles and 3200 looms, employing about 2500 persons. The Lane Mills manufactures denims and cottonades, the Maginnis Mills sheetings, drills, duck, osnaburgs and colored chambrays, the Mississippi Mills fine dress goods, flannelettes and cashmeres, cottonades and woollens. Mr. S. Odenheimer is president; W. T. Maginnis and Maurice Stern, vice-presidents, and Harry T. Howard, secretary, of the Lane-Maginnis Mills Corporation.

Southern Woolen Mills Combine.

It is announced that five of the best-known woolen-mill enterprises of the South will combine into one corporation to be known as the American Textile Woollens Co., main offices at Chattanooga, Tenn. The plants to be taken over are the Park Woolen Mills, Rossville, Ga.; the Louisville (Ky.) Woolen Mills, the Sweetwater (Tenn.) Woolen Mills, the Athens (Tenn.) Woolen Mills and the Atlanta (Ga.) Woolen Mills. The new company's officers will probably be W. M. Nixon of Atlanta, president, and F. A. Carter of Sweetwater, secretary, and will locate at Chattanooga. The present mill companies have a total capitalization of \$850,000, operate 26,784 spindles and 1272 looms, and employ 1545 persons. Their product is principally jeans, and it is understood the consolidation gives control of the Southern output of this grade of cloth. According to present plans the company will have a capital stock of \$2,500,000, half to be common and half preferred stock.

The Swift Spinning Mills.

The stockholders of the Swift Spinning Mills of Columbus, Ga., held a meeting last week and formally organized by electing E. W. Swift, president; Clifford J. Swift, vice-president and general manager, and J. P. Kyle, secretary-treasurer. The directors chosen were Messrs. Swift, Kyle, A. Hillges, F. J. Jenkins, O. C. Bullock, E. J. Rankin, Rhodes Browne and J. P. Hillges. The MANUFACTURERS' RECORD

reported the incorporation of this company recently, and on December 6 stated the plan to be the erection of a modern yarn mill of 10,000 spindles. The main building will be three stories high, 134x178 feet, and the architects in charge are Messrs. Makepeace & Co. of Providence, R. I. The Swift Spinning Mills is capitalized at \$125,000.

Reported to Enlarge Plant.

It is reported that the Pacolet Manufacturing Co. of Pacolet, S. C., will build an addition 107x110 feet in order to provide space for more machinery. This company is about completing its mill No. 5, which will have an equipment of 27,000 spindles and 1000 looms. The new mill has been under construction for some time. It comprises a main structure three stories high, 107x400 feet, erected under contract by Messrs. G. H. Cutting & Co. of Worcester, Mass., after plans and specifications by Messrs. Lockwood, Greene & Co. of Boston, Mass., who were the architects in charge. Mr. Victor Montgomery of Spartanburg, S. C., is president of the Pacolet Manufacturing Co.

The Warioto Cotton Mills.

Last week the stockholders of the Warioto Cotton Mills of Nashville, Tenn., met and voted an issuance of bonds to the amount of \$200,000. This company has been reported previously. It purchased the Tennessee Manufacturing Co. plant, and after taking out the old machinery began to install new and modern equipment, to include 20,000 spindles and 500 looms. Steady progress is being made with the installations, and manufacturing is expected to begin by February 1. Mr. J. B. Morgan is treasurer of the company, which has a capital stock of \$200,000.

The Dresden Cotton Mills.

Referring to the Dresden Cotton Mills, mentioned at length last week, it may be added that the company's building is one story high with basement, 400 feet long by 77 feet wide, boiler and engine room attached. The 10,000 ring spindles, 27 cards and other machines are now being installed, and manufacturing is expected to begin by March 1. Hosiery yarns on cones will be the product. The D. A. Tompkins Company of Charlotte, N. C., was architect for the plant, and the Dresden Company was the builder. Plant is located at Lumberton, N. C.

Changing to Yarn Production.

In November the MANUFACTURERS' RECORD referred to the Trenton (Tenn.) Cotton Mills as to change its production from cloth to yarn. The company has since awarded contracts for the necessary machinery, the contractors being E. A. Leigh of Boston, Mass., and the Fales & Jenks Machine Co. of Pawtucket, R. I. This equipment is now being installed, and when in position the Trenton Cotton Mills will operate 6000 spindles on the manufacture of skein yarns. About 75 operatives will be employed.

Adding 2500 Spindles.

The Royal Bag & Yarn Manufacturing Co. of Charleston, S. C., has awarded contracts for additional machinery, including 2500 spindles and the accompanying carding apparatus. There is space in the present buildings for this equipment. When the new machinery is in position the company will have a total of 10,000 spindles and 320 looms, employing 375 operatives and producing osnaburgs, sheetings and ply and single yarns.

The Vaughn Hosiery Mills.

The Vaughn Hosiery Mills of Vaughn, N. C., has been incorporated with capital

stock of \$25,000 and privilege of increasing to \$100,000 by Messrs. R. S. Spiers and others of Vaughn, E. W. Thompson and J. A. Nicholson of Macon, N. C.; H. S. Spiers of Smithfield, Va., and others. This company was previously reported by the MANUFACTURERS' RECORD as organized and as having established a plant of 50 machines, with dyehouse, for the production of 500 dozen pairs of seamless black cotton hosiery.

The Cotton Movement.

In his report for December 21, Col. Henry G. Hester, secretary of the New Orleans Cotton Exchange, shows that the amount of cotton brought into sight during 112 days of the present season was 7,411,570 bales, an increase over the same period last year of 741,889 bales. The exports were 3,703,337 bales, an increase of 469,108 bales. The takings were, by Northern spinners, 1,051,135 bales, a decrease of 85,597; by Southern spinners, 920,291 bales, an increase of 23,607 bales.

Is Doubling Its Plant.

The Walton Cotton Mill Co. of Monroe, Ga., has completed the erection of buildings which will enable it to install sufficient equipment to double its present plant. Contracts for the new machinery, including 5000 spindles and 160 looms, were awarded some time ago, and the additional equipment is now being received. Denims, heavy sheetings and drills are manufactured in the Walton mill.

Adding 5000 Spindles.

The Toxaway Mills of Anderson, S. C., has awarded contract for and is now receiving for installation 5000 spindles and 125 looms additional to previous equipment. This new machinery is expected to be in operation before the end of January. The company has been operating 12,000 spindles and 368 looms. It was referred to last week.

Textile Notes.

It is understood that N. C. Roe of Monticello, Ark., is planning to build a cotton mill at Little Rock, Ark.

The recent report that the Southern Manufacturing Co. of Athens, Ga., will double its plant is not true, but such an enlargement is contemplated. The company is operating 7728 spindles and 184 looms.

The Greensboro (N. C.) Manufacturing & Coal Co. has been incorporated with capital stock of \$50,000 for manufacturing cotton goods, ice, etc., by Messrs. W. B. Hackett, A. N. Perkins, W. B. Hunt and W. B. Ross.

It is proposed to organize stock company to establish a cotton pickery at Charleston, S. C., and probably George Lunz can give information. This subject will be discussed at the Cotton Manufacturers' Association meeting to be held in Spartanburg in January.

The Banna Manufacturing Co. is being organized with capital stock of \$75,000 to take over and operate the Banna Cotton Mills, a plant of 7100 spindles at Goldville, S. C. Messrs. George M. Wright of Union, S. C.; Gadsden E. Shand and J. P. Matthews of Columbia, S. C., are interested.

It is announced that the North German Lloyd steamship Wittekind will sail from Bremen, January 16, on a second trip to Charleston, S. C., to which place it brought nearly 500 first-class immigrants a few weeks ago.

The Board of Trade of Maxton, N. C., has elected Messrs. T. D. Evans, president and treasurer; A. J. McKinnon and S. B. McLean, vice-presidents, and L. T. Cook, secretary.

FOREIGN LETTERS

The MANUFACTURERS' RECORD is so widely read in foreign countries that we are in constant receipt of many letters from all parts of the world. Some of these letters indicate the disposition of foreigners to buy American goods, and are therefore of interest to our readers.

Barbary Needs American Manufactures.

Eugene Tonna & Co., Tripoli, Barbary: "We place ourselves entirely at your command in quality of correspondents at this place, and shall be happy to give you any information you may wish. We take a lively interest in the introduction of American goods into our country, and in order to assist therein we submit our ideas on the subject. In order to extend and foster trade of America in Tripoli it would be necessary to open a special bureau of information with a place for the display of samples. Each manufacturer desiring to export to Tripoli could communicate with this bureau, could there show samples, and the office would charge itself with making sales either directly or by agents. Each factory could pay an annual sum, to be fixed by yourselves, for the purpose of covering the expenses of the enterprise. We believe that our method of securing business would greatly facilitate trade between the two countries."

Machinery for Italy.

Hentelbach & Pesaro, via Fratelli Ruffini, 7, Milan, Italy;

"We would be very pleased to enter in business connection with the most important American industrial enterprises. We are general agents and have a great interest for introducing foreign machines, such as agricultural machines and industrial machines of any kind, machines for working metal, wood materials for railways, steel, technical instruments and so on; also arms, knives, etc. Our firm is registered to the Board of Trade and well based. We could give you first-class references also from our bankers."

American Machinery for Argentine.

Antonio R. Estela, Buenos Ayres, Argentine Republic:

"I permit myself to address you with the offer of my services to any factory you may know of which desires to introduce its machinery into my country—motors of any kind, engines, saws for working up timber, naphtha motors of any kind. I am now engaged in this kind of labor and continuously sending out circulars throughout the country. I should be happy to act as agent, provided catalogues are sent me with my name printed in them or am otherwise compensated. My reference is Dunn's agency."

American Goods for Haiti.

Henri Tseseau, secretary Chamber of Commerce, No. 5 Rue Capais, Port-Au-Prince, Haiti:

"I wish you could let me know what American products are most available for us. I could introduce pretty much any kind of American goods here providing I am given the sole agency for the article in the island. Our country is a fine market, and present relations enable us to get good results in every line of commerce."

Industrial Products for Holland.

Bergmann & Co., Jan Steenstraat 114 hoek Amsteidjik, Amsterdam, Holland:

"Our line is different commercial goods. We are dealing in, for instance, tools, tool steel, bicycles, lamps, etc. We have had many years' experience joined to good connections."

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MINING

Developing Coal and Lime.

The Gladys Coal & Lime Co. has been incorporated by Messrs. Al Stanley and John Bogenschott of Chattanooga, Tenn., and J. W. Vanderhurt of Birmingham, Ala., for the purpose of developing a tract of 640 acres of coal and lime land near Bass Station, Ala., on the line of the Nashville, Chattanooga & St. Louis Railway. The property is said to be underlain with heavy seams of coal, beside containing extensive deposits of high-grade rock. It is stated that shafts have been driven to a depth of 500 feet, disclosing over nine feet of clear, solid hard coal. Negotiations are pending for the purchase of 1000 acres additional, and it is understood that a railroad will be constructed to connect the property with the main line of the Nashville, Chattanooga & St. Louis Railway at Bass Station, a distance of about two miles.

Cars Needed to Move Ore.

A dispatch from Joplin, Mo., states that lack of cars to ship lead and zinc ore from that district may cause the value of the year's output to fall several thousands of dollars below the estimated value of \$15,000,000. The ore, it is said, has been produced and purchased, but if it cannot be shipped it will not show on this year's shipment estimate. The continued shortage of cars has changed the zinc market from an active one three weeks ago to a passive demand, and this situation has forced the accumulation of approximately 7000 tons of reserve ore at the mines.

Mining and Smelting.

Articles of incorporation have been filed at Carthage, Mo., for the Cathedral Mining & Smelting Co. of New York city, with a capital stock of \$1,500,000. It is stated that H. W. Blair, attorney, of Carthage, has recorded the purchase of several leases in the district for the company, the largest being the Whitsett tract at Duenweg, and that arrangements are being made for the erection of five mills, each to have a daily capacity of 500 tons. Officers of the company are Messrs. S. F. B. Morse of New York city, president, and James P. Newell of Carthage, Mo., vice-president.

Coal Company's Improvements.

Reports from Bluefield, W. Va., announce that improvements to the extent of about \$100,000 have been made to the Davy Crockett and Helena coal properties by the Superior Pocahontas Coal Co., which recently acquired them. The company proposes opening two mines on Davy creek, and two coal tipples, beside a number of new houses, are in course of construction. One mile of standard-gauge railroad has been laid from the mines to Davy station, and it is expected to have the mines in operation by February 1, 1907.

State to Buy Coal Lands.

The Board of Prison Commissioners of Tennessee has authorized the purchase of the Kittel coal lands in Bledsoe, White, Van Buren and Sequatchie counties for convict mining. This property is said to have been examined by experts, who pronounce it almost entirely underlain with seams of Bon Air and Sewanee coals. It embraces an area of about 11,000 acres, and the purchase price specified is \$12 per acre. The resolution authorizing the purchase is subject to the approval of Governor Cox.

Increases Capital Stock.

The Green River Coal Co. of Spottsville, Ky., has increased its capital stock from \$100,000 to \$125,000 for the purpose of conducting more extensive development

operations on a tract of 400 acres of coal land which the company owns on Green river. A tippie and new tracks have been constructed on the property during the past summer at an expenditure of about \$30,000, and the company is at present installing a modern electric system for the operation of its mines. Stockholders of the company have elected the following officers for the ensuing year: Messrs. William Cleland of Donora, Pa., president; E. C. Hubbard, Evansville, Ind., general manager; R. L. Bidle, Donora, Pa., secretary; Thomas Stokes, Henderson, Ky., store manager.

Another West Virginia Company.

Another coal-mining company for developing property in West Virginia is the Birch River Coal & Coke Co., which has been incorporated by Charleston capitalists. The principal operations of the company will be conducted at Cowan, in Webster county, but definite details as to the commencement of development work have not been announced. Among the incorporators of the company are Messrs. C. B. Couch, J. M. McConihay, E. A. Reid, A. S. Alexander and Murray Briggs.

Buy Coal and Timber Lands.

A dispatch from Sergeant, Ky., states that Samuel Aston and associates of Cleveland, Va., have closed negotiations for the purchase of about 6000 acres of coal and timber lands in Knott county, Kentucky, which it is proposed to develop. It is understood that a railroad extension will be constructed at once with a view to starting development work by the spring.

Arrangements are being made by the Great Southern Mica Co. of Cleveland, Ohio, recently organized with a capital stock of \$100,000 for developing mica and other mineral lands in Randolph county, Alabama. Incorporators of the company are Messrs. Hubert H. Ward, Carlos M. Stone, C. E. Sullivan, R. M. Calfee and Edward C. Hahn.

The New Woodstock Corporation.

A special dispatch to the MANUFACTURERS' RECORD last week from Birmingham, Ala., reported the sale of the Woodstock Iron Works of Anniston, Ala., to Messrs. James M. Barr of Norfolk, Va.; J. B. Carrington of Birmingham, Ala., and their associates. Since the announcement of the sale the new company has been incorporated to take over and operate the Woodstock plants and develop the mineral lands to their full possibilities. This new company is known as the Woodstock Iron and Steel Corporation, with a capital stock of \$1,500,000. Mr. Barr will be president, Mr. Carrington, vice-president, and T. W. Wagner of Norfolk, secretary. The Woodstock properties include two blast furnaces (one of 200 tons and the other of 300 tons capacity daily), 374 coke ovens with an annual capacity of 155,000 net tons, 53,500 acres of iron lands (18,000 acres carrying brown and red ores), 8000 acres of coking coal, limestone quarries, 400 miners' houses, commissary buildings, etc. In addition, 5000 acres of iron lands are held under lease. Mr. Henry T. De Barleben of Birmingham, Ala., will have charge of the furnaces and ore properties. Among those interested in the Woodstock Iron and Steel Corporation are Messrs. Ernest Williams of Lynchburg, Va.; W. R. Bonsal of Hamlet, N. C.; B. L. Dulaney of Bristol, Tenn.; R. H. Elliott of Birmingham, Ala., and W. H. McQuail of Pottsville, Pa.; main offices of company at Norfolk, Va.

The assessment of property in Lexington, Ky., for 1907 is \$22,012,106, an increase of \$2,687,006 over this year's assessment.

MECHANICAL

Breaking Weight of Yarn.

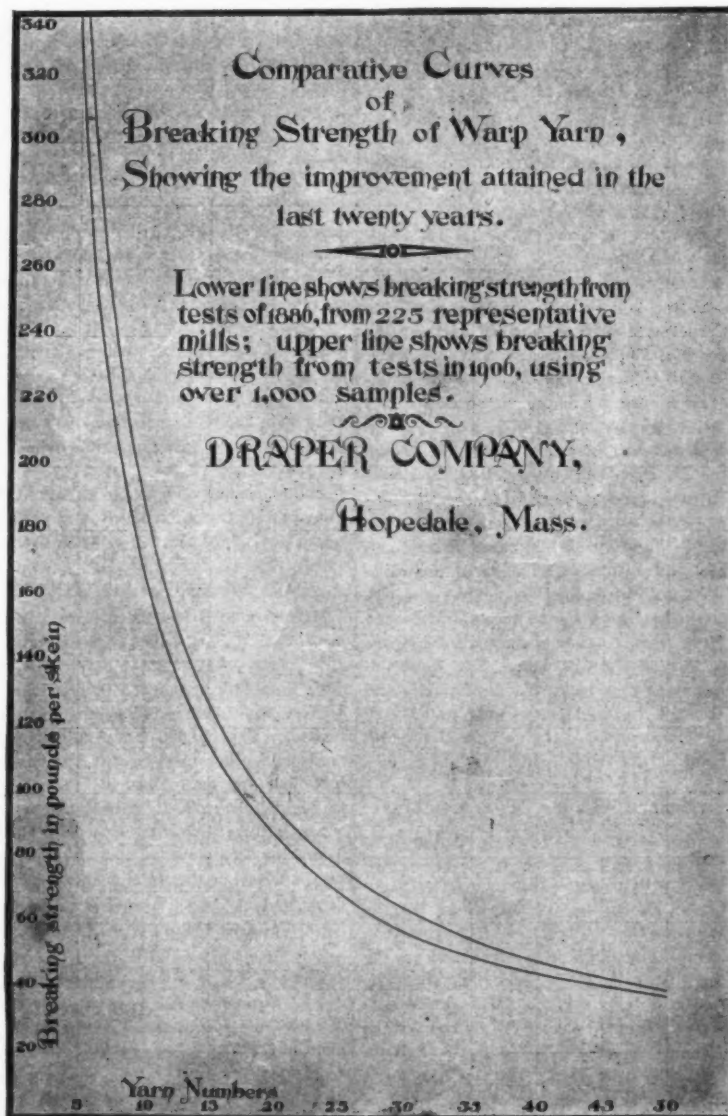
Progressive textile manufacturers will be interested in the accompanying diagram of the breaking weight of yarns. This table has been completed recently after tests with yarn received, by request, from several hundred cotton mills throughout the country. It is the work of the Draper Company of Hopedale, Mass., which company treats the subject at length in the November number of *Cotton Chats*, copies of which publication will be sent to any cotton-mill manager not already on the *Cotton Chats* mailing list. The Draper Company says: "The table which we print gives our old standard, which was figured in 1886, and it also gives the new standard divided into sections. The first new table

the new standard with a hand tester need not assume that their yarn is necessarily inferior. We will be glad to test sample yarns sent us on the power tester for any mills which wish to get a comparison with their own results.

"The new tables are figured from constant curves which contain the majority of points plotted from the actual results. Those wishing to make a very careful or scientific comparison of yarns can compute the result in decimals from the formulae of the curves, which are as follows:

"For carded warp yarn, add the number of yarn to 1900 and divide by the number to get the standard breaking strength.

"For combed warp yarn, multiply the number of the yarn by 4, subtract from 2600 and divide the quotient by the number.



THE BREAKING WEIGHT OF YARN.

for warp yarn is arranged from average tests of carded yarn, which averages about strict middling in grade. The combed warp table is made up of yarns made from slightly under good middling in grade. The soft twisted yarn was selected from yarns which average 3.25 times the square root of the number in twist, the grade of the cotton averaging about strict middling. Very soft or very hard twisted filling was eliminated from this test. We were surprised to note the strength of the soft twisted yarn in the coarser numbers. The yarns were tested on a Brown Bros. strength tester run by power at a speed of 190 revolutions. We believe that the power tester breaks considerably stronger than a hand tester, but we do not believe the hand tester a proper device for careful comparative tests.

"Those whose yarn does not break up to

"For soft twist yarn, multiply the number by 13, subtract from 1900 and divide the quotient by the number."

The diagram illustrated and the table referred to are both presented in the November *Cotton Chats*, together with other accompanying statements which all cotton manufacturers interested in the breaking strength of warp yarn should examine.

A Reversible Fan.

Inquiries have recently been made from manufacturers in the North and South which have resulted in facts that must be satisfying, if not a little surprising.

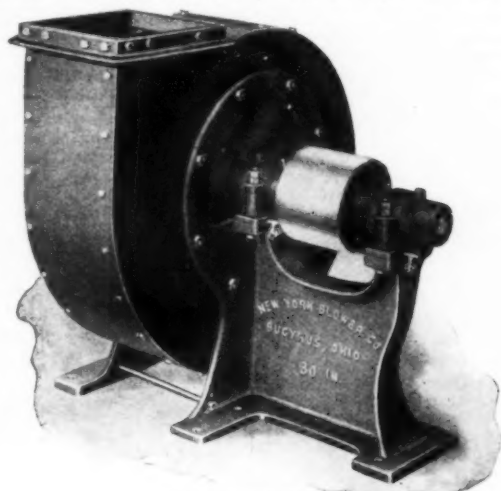
Over a year ago the New York Blower Co., offices at Twenty-fifth place and Stewart avenue, Chicago, and works at Bucyrus, Ohio, conceived the idea that a fan to handle shavings, wool, cotton, dust, sawdust and stringy material should be re-

versible as to hand and discharge, and should be provided with a wheel which would be unobstructible.

The officers of the company worked diligently with this end in view, and now offer

Fig. 3 shows the suction side removed, presenting a view of the inside of the fan, from which can be secured a pretty clear idea of how the wheel is constructed.

The principal feature of this wheel is,



1.—A REVERSIBLE FAN.

what is said to be a new evolution in the planing-mill exhausters. An accompanying illustration (Fig. 1) shows the New York Blower Co.'s reversible fan, with a right-hand vertical up discharge.

as can be easily ascertained, the fact that the blades are cast directly into the cone of the wheel. Fig. 4 illustrates how this is done, and shows the inlet side of the wheel.

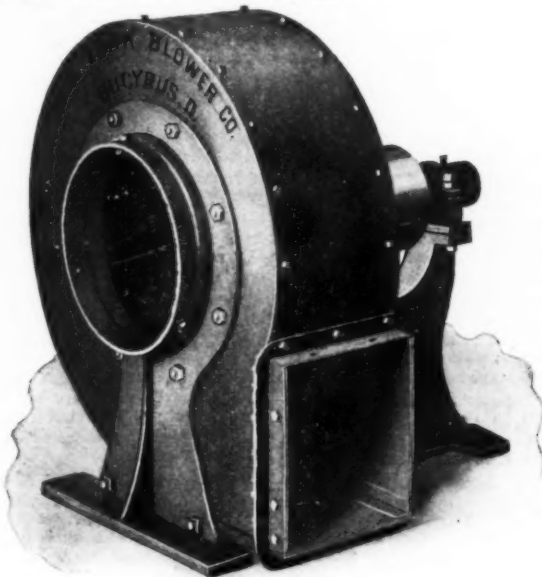


FIG. 2.—A REVERSIBLE FAN.

Anyone familiar with fans can easily note the strong points of this one. Note the very short overhang, which, of course, makes the fan unusually rigid.

Fig. 2 shows the other side of the fan,

There are no rivets to work loose.

The fan is built solid, so as to run without a tremor at maximum speed. It is provided with increased pulley surface, the crown sheet and inlet being made of steel.

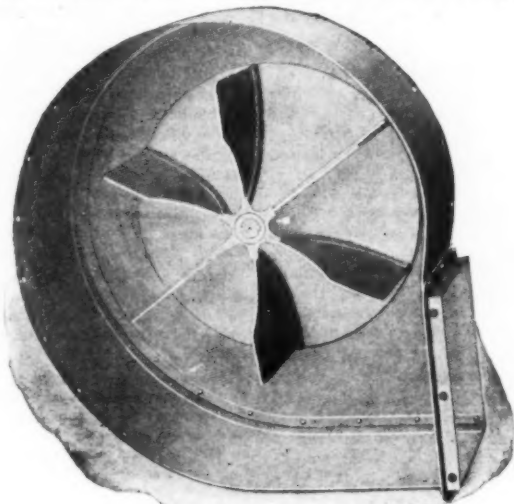


FIG. 3.—A REVERSIBLE FAN.

in this instance a right-hand bottom horizontal discharge, with inlet side exposed to view, as well as a minor portion of the wheel.

There is no buckling of suction side while at high speed.

The fan is provided with universal adjustment of bearings, not simply up and

down, and the bearings are double ring oiling of the best babbitt, and reamed to size. This type fan is made in sizes from 30 inches to 60 inches, either single or double.

It is peculiarly adapted for the purposes for which intended—handling shavings, wool, cotton, etc.

Big Producer-Gas Power Plant.

The plant of the Iola (Kan.) Portland Cement Co. at Dallas, TEXAS, is notable in that it is claimed it will have the largest producer-gas power installation in the world. At other plants of the Iola Company both gas engines and steam en-

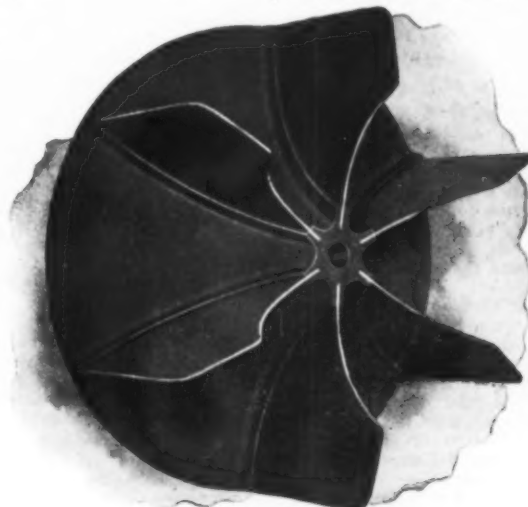


FIG. 4.—A REVERSIBLE FAN.

Inquiries should be forwarded to the New York Blower Co.'s offices in Chicago.

The Parmelee Pipe Wrench.

Dealers in and users of pipe wrenches will note the accompanying view of the Parmelee pipe wrench. It is stated the wrench will positively not slip, even on oily pipe; will not even crush or flatten pipe. The wrench consists of a jointed girdle or girth hinged to the end of a handle by a slip pin.

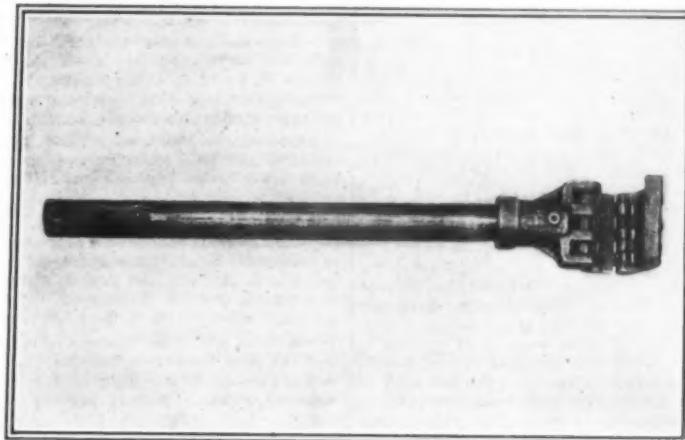
When the force is exerted on the handle the girth grips the pipe with equal pressure all around, and the hold is instantly so firm that there is no slipping.

The greater the force required to turn the pipe the stronger the grip on the pipe.

The wrench has a smooth surface against the pipe, therefore it cannot chew the pipe, and may be used on threads as

gines have been employed, so that in selecting the type of prime mover for their Dallas plant it was with a knowledge of the capabilities of the respective powers. The decision was influenced by the saving in fuel consumption possible by the adoption of gas for power purposes.

The Loomis-Pettibone gas-generating system, built by the Power & Mining Machinery Co. of Cudahy, Milwaukee, Wis., will be furnished in three units having a total capacity of 4500 horse-power. Bituminous coal and Texas lignite will be the fuels used, the Loomis-Pettibone system being adapted to the gasification of either fuel without changes in the apparatus, and the resultant gas is guaranteed to be fixed, clean and suitable for use in gas engines.



THE PARMELEE PIPE WRENCH.

well as any other place on pipe. It can be used on polished brass and nickel-plated pipes or piston rods, and will not mar them in any way.

The grip of this wrench is a complete contact on the entire circle of pipe, and is not exerted on two or three points as with a jaw wrench, nor are there any new jaws to be replaced or teeth to be sharpened.

The Parmelee pipe wrench is distributed by the General Engineering & Supply Co., Colorado Building, Washington, D. C.

The Chamber of Commerce of Gainesville, Ga., has been organized with Messrs. C. H. Allen, president; J. E. Redwine, Jr., vice-president; W. C. Thomas, secretary; J. H. Hunt, treasurer, and J. C. McConnell, P. M. Parker and G. F. Turner, executive committee.

The Snow Steam Pump Works of Buffalo, N. Y., will furnish for this plant four of its single-tandem double-acting gas engines, each with a normal capacity of 1100 B. H. P. These engines will be direct connected to alternating-current 25-cycle electric generators of 810 kilowatt capacity each, and will operate in parallel.

Continuous operation, 24 hours per day, seven days per week, is required of the power plant.

High efficiency is promised by the builder of the power apparatus, and the guarantee of a kilowatt per hour at the switchboard from one and one-half to one and three-quarters pounds of bituminous coal or from two and one-half pounds of lignite, when operating at three-quarters to full load, assures cheap power to the Iola Cement Co.

Construction Department

TO OUR READERS!

In order to understand and follow up properly the Construction Department items, please bear in mind the following statements:

EXPLANATORY.

The MANUFACTURERS' RECORD seeks to verify every item reported in its Construction Department by a full investigation and complete correspondence with everyone interested. But it is often impossible to do this before the item must be printed, or else lose its value as news. In such cases the statements are always made as "rumored" or "reported," and not as positive items of news. If our readers will note these points they will see the necessity of the discrimination, and they will avoid accepting as a certainty matters that we explicitly state are "reports" or "rumors" only. We are always glad to have our attention called to any errors that may occur.

* Means machinery, proposals or supplies are wanted, particulars of which will be found under head of "Machinery, Proposals and Supplies Wanted."

In correspondence relating to matters reported in this paper, it will be of advantage to all concerned if it is stated that the information was gained from the MANUFACTURERS' RECORD.

ADDRESS FULLY.

To insure prompt delivery of communications about items reported in these columns, the name of one or more incorporators of a newly incorporated enterprise should be shown on the letter addressed to that town, or to the town of the individual sought, as may be shown in the item, as sometimes a communication merely addressed in the corporate or official name of a newly established company or enterprise cannot be delivered by the postmaster. This will help to insure prompt delivery of your communication, although it is inevitable that some failures on the part of the postal authorities to deliver mail to new concerns will occur.

WRITE DIRECTLY.

It is suggested to advertisers and readers that in communicating with individuals and firms reported in these columns, a letter written specifically about the matter reported is likely to receive quicker and surer attention than a mere circular.

ALABAMA.

Aniston, Ala.—Iron Furnaces, Coke Ovens, Coal and Iron Mines.—The Woodstock Iron & Steel Corporation has been incorporated with capital stock of \$1,500,000 to take over and develop the Woodstock Iron Works properties, referred to last week as purchased by James M. Barr of Norfolk, Va., and J. B. Carrington of Birmingham, Ala. This company proposes to blow in one furnace immediately and later put the second furnace in operation. Contract has been awarded for relining one furnace. One plant has 200 tons and one 300 tons capacity daily. The other Woodstock properties are 53,500 acres of land, 8000 acres of coking coal, large deposits of limestone, 374 coke ovens, 400 miners' houses, commissary buildings, etc., and 5000 acres of iron-ore lands are held under lease. H. T. De Bardeleben of Birmingham will manage the furnaces and L. B. Parsons the ore mines. The new company will organize with Mr. Barr, president; Mr. Carrington, vice-president, and T. W. Wagner (of Norfolk), secretary; offices of the president at Norfolk, Va., where correspondence should be addressed. Others interested are R. H. Elliott of Birmingham, Ala.; Ernest Williams of Lynchburg, Va.; B. L. Dulaney of Bristol, Tenn.; W. H. McQuall of Pottsville, Pa., and W. R. Bonsal of Hamlet, N. C.

Birmingham, Ala.—Railroad Repair Shop and Engine-house.—Reported that the Illinois Central Railroad will arrange for the erection of repair shop and engine-house. A. S. Baldwin, Chicago, Ill., is chief engineer.

Birmingham, Ala.—Cylinder Brace and Tool Works.—American Cylinder Brace & Tool Manufacturing Co., recently organized at West Palm Beach, Fla., with \$10,000 capital stock, has secured site at Ironton for the location of plant, and is arranging for the erection of necessary buildings. Wm. Helm of West Palm Beach, Fla., is president and M. E. Spence secretary-treasurer.

Birmingham, Ala.—Sewerage System.—C. M. Burkhalter has been awarded contract at \$7333 for the construction of the Woodlawn

line sewer and Dunn & Lallande Bros. contract at \$8950 for repairing the Village creek sewer. Bids will also shortly be asked by the Jefferson County Sanitary Commission for constructing the Avondale branch of the Village creek sewer; length one and a third miles. Julian Kendrick is City Engineer.

Birmingham, Ala.—Street Paving.—R. Blackburn, 1119 North 25th street, has contract for sidewalk paving and Dunn & Lallande Bros. contract for grading, curbing and concrete gutter.

Cullman, Ala.—Furniture Factory.—Dreher Manufacturing Co., reported incorporated December 13 with \$50,000 capital stock, will manufacture furniture. A two-story factory building 50x150 feet and two-story warehouse 60x150 feet will be erected. A. Dreher, Jr., is president and treasurer.*

Curtiston, Ala.—Lumber Company.—American Timber Co. has been incorporated with \$100,000 capital stock by A. E. Swanson, D. L. Young, J. A. Smith of Curtiston and D. G. Curtis and M. W. Threne of Erie, Pa.

Demopolis, Ala.—Steel Bridge.—Demopolis Improvement Co. has been organized with John C. Webb, president; John C. Webb, Jr., vice-president, and B. F. Elmore, secretary. It is proposed to build a steel bridge across the Tombigbee river; main span to be 341 feet; total length of steel structure 486 feet, with trestles leading to the bridge proper; entire structure to be 865 feet and cost \$35,000.

Gadsden, Ala.—Steam Laundry.—Pettus Lee has purchased and will operate the Gadsden Steam Laundry, W. E. Lucy, proprietor.

Gadsden, Ala.—Cotton Gin.—Butler-Kyser Oil & Fertilizer Co. of Huntsville and Albertville, Ala., has purchased the plant of the Gadsden Gin Co., and the Queen City Gin Co. has been incorporated with \$5000 capital stock to continue its operation. A cottonseed-oil mill will probably be erected.

Mobile, Ala.—Overall Building.—Kahn Manufacturing Co. has been formed by Sol Kahn and associates for the establishment of overall factory referred to December 20. A building has been secured and 50 machines will be installed. Postoffice Box 184.

Montgomery, Ala.—Street Paving.—Memphis Asphalt & Paving Co. of Memphis, Tenn., has contract for paving Caroline and Wilson streets at \$8032 and \$3376 respectively, and the Southern Bitulithic Co. of Birmingham, Ala., at \$17,765 for paving Montgomery street with bitulithic paving.

Montgomery, Ala.—Gardening and Farming.—Riverside Company has been incorporated with \$25,000 authorized capital stock by William B. Marks, H. C. Borden and Paul T. Sayre to conduct a dairy, engage in market gardening, fruit-raising, etc.

Prattville, Ala.—Water-works and Sewerage.—City will issue \$30,000 water-works and \$10,000 sewer bonds. Address The Mayor.

Randolph County, Ala.—Mica Mines.—Great Southern Mica Co. of Cleveland, Ohio, recently organized with \$100,000 capital stock by Hubert H. Ward, Carlos M. Stone, C. E. Sullivan, R. M. Caffie and Edward C. Hahn, is arranging for the development of mica and other mineral lands in Randolph county.

Rock Run, Ala.—Iron Furnace.—Reported that the Bass Foundry & Machine Co. will shortly blow out its furnace in order to make necessary repairs. Annual capacity 15,000 tons.

Sanford, Ala.—Turpentine Company.—Henry Elliot, J. D. Henderson, G. O. Waits and W. W. Varn have incorporated the Varn Turpentine Co. with \$10,000 capital stock.

Selma, Ala.—Cottonseed-oil Mill, Cotton Gin, etc.—Selma Oil, Ice & Fertilizer Co., recently incorporated with \$80,000 capital stock, has purchased the cottonseed-oil mill, cotton gin and ice plant of the International Cottonseed Oil Co. and will continue operating same. (Referred to December 13.)

Stevenson, Ala.—Coal and Lime Development.—Gladys Coal & Lime Co., incorporated for the development of coal properties about five miles from Stevenson, owns 640 acres and negotiations are pending for 1600 acres adjacent; shafts have been sunk to a depth of 500 feet and mining of coal has begun. It is proposed to develop lime deposits. J. W. Vanderhurd of Birmingham, Ala.; Al Stanley and John Bogenschott of Chattanooga, Tenn., incorporators.

ARKANSAS.

Argenta, Ark.—Sewerage System.—Contract will be let January 10 for the construction of sewerage system. W. C. Faucette is president of Board of Public Affairs.*

Batesville, Ark.—Cannery.—The establishment of canning factory with a daily capacity of 10,000 cans is being considered. E. W. Owens of Cassville, Ark., is said to be interested.

Burdette, Ark.—Planing Mill.—Three States Lumber Co., Tennessee Trust Building, Memphis, Tenn., is installing a medium-sized planing mill with a view of preparing stock for market; investment, \$10,000. (Referred to last week.)

Carthage, Ark.—Lumber Company.—Carthage Lumber Co. has been incorporated with \$10,000 capital stock by D. A. McCrea, W. B. Hill, F. W. Morris and N. A. Terry.

Eldorado, Ark.—Water-works.—The installation of water-works is being considered. Address The Commercial Club.

Eureka Springs, Ark.—Telephone System.—Ozark Bell Telephone Co. has been incorporated with \$25,000 capital stock by C. S. Gind, D. E. Palmer, G. M. Sebree, W. M. Duncan and M. D. Jordan.

Hardy, Ark.—Lumber Company.—Morgan Company has been organized with \$25,000 capital stock. John H. Reid is president; John A. Parker (Louisville, Ky.), vice-president; C. V. Morgan, secretary, and W. B. Morgan, treasurer.

Little Rock, Ark.—Distillery.—E. B. Wilson, Pittsburg, Pa., states there is no truth in the report mentioned December 20 that he contemplated building distillery.

Little Rock, Ark.—Sewerage System.—Contract will be let December 31 for the construction of septic-tank sewer main and laterals for Sewer District No. 48; C. M. Connor, secretary.*

Magazine, Ark.—Cannery.—It is proposed to establish canning factory to cost \$4100, and a company will be organized to operate same. N. H. Burnett is interested.

Marmaduke, Ark.—Timber Development.—It is reported that W. E. Talley of Jonesboro, Ark., has purchased 4900 acres of timber land near Marmaduke for development.

Parma, Ark.—Mill and Lumber Company.—Samuel Newhouse, T. S. Estabrook, S. N. Bonner, H. R. Abdill, E. E. Shelle, Joseph H. West, E. Y. English and C. P. Harnwell have incorporated the Newhouse Mill & Lumber Co. with \$80,000 capital stock.

Perryville, Ark.—Bridge Construction.—Virginia Bridge & Iron Co., Roanoke, Va., has contract at \$59,700 for the construction of four bridges in Perry county.

Pine Bluff, Ark.—Timber Land.—Reported that Flechner & Co. of Memphis, Tenn., have purchased the timber rights on 600 acres of land near Pine Bluff.

Russellville, Ark.—Electric-light Plant.—T. B. Martin, Jr., Little Rock, Ark., will install electric-light plant.*

Springtown, Ark.—Gas and Oil Wells.—Springtown Development Co. has been incorporated with \$5000 capital stock by G. W. Rouse, W. D. Wasson, George A. Smith, L. N. Dodgen, E. C. King, O. W. Patterson and others to drill for gas and oil wells.

Van Buren, Ark.—Reported that the Centerville Iron Works of Centerville, Iowa, has secured site and will arrange at once for the establishment of plant.

DISTRICT OF COLUMBIA.

Washington, D. C.—Oil Storage.—The American Oil Storage Co. has been incorporated with capital of \$25,000 by A. H. Collins, 1330 New York avenue N.W.; C. J. Lockwood, Samuel Thomas and Charles Diggs, all of Washington, D. C., and Bruce Robinson, 909 North Fulton avenue, Baltimore, Md.

Washington, D. C.—Power and Heating Plant.—Captain Poole, engineer officer in charge of the State, War and Navy Building, has recommended to Congress the renewing and remodeling of power and heating plant in the building at cost of about \$109,000.

FLORIDA.

Jacksonville, Fla.—Subway.—Board of Public Works has approved plans submitted by J. W. Richardson, engineer of the Jacksonville Terminal Co., for proposed subway, and bids for the construction work will be advertised at once to be opened January 15. The plans call for a subway constructed of concrete and asphalt mastic, perfectly water tight; the floor or driveway of the subway to be slightly below the level of high tide. The total length of subway and approaches will be 500 feet; the covered portion, that is, the portion that will pass under the railroad tracks, 162 feet; total width 53 feet and 4

inches, to be divided into two driveways, each 15 feet wide and 11 feet high; two sidewalks for foot passengers, each 4 feet and 8 inches; through the center space for electric cars, 12 feet wide and 13 feet high.

Old Town, Fla.—Reclaiming Marsh Lands.—Reported that John M. Wright of Fernandina, owning extensive marsh lands in this vicinity, with Cassius M. Gillette, engineer, Fernandina, Fla., will perfect plans for reclaiming these lands, constructing dyke about 1200 feet long and a roadway at the foot of the marsh from Old Town across to the Fort Clinck reservation. The property contains 630 acres of marsh land and 325 acres of high land.

St. Petersburg, Fla.—Steam Laundry.—S. R. Pyles has purchased building which will be equipped as steam laundry. Machinery has been purchased.

Whitfield, Fla.—Sawmill.—Reported that J. I. Kelley Co. is arranging to rebuild sawmill recently burned.

GEORGIA.

Adairsville, Ga.—Brick Works.—Georgia Brick Co. has been organized to establish brick plant.

Americus, Ga.—Cotton Mill.—Reported that Frank Head of Nashville, Tenn., has submitted a proposition to organize a \$125,000 stock company for the purpose of building a cotton factory in Americus.

Athens, Ga.—Cotton Mill.—Report lately mentioned that the Southern Manufacturing Co. will double its plant is not correct, but such an enlargement is contemplated; present equipment 773 spindles and 184 looms.

Atlanta, Ga.—Steam Laundry.—Atlanta Hand Laundry Co., reported incorporated December 13, will erect a two-story building 90x35 feet. About \$5000 will be expended in equipment. H. E. Summers is general manager; address, 115 Garrett street.

Atlanta, Ga.—Plaster Mills.—Chartered: Atlanta Fibred Plaster Mills, with \$5000 capital stock, by J. M. Stephens, Jr., and others.

Augusta, Ga.—Pottery.—T. L. Hahn and H. Russell Cohen have organized the Hahn Pottery Co. for the establishment of pottery in North Augusta. Site has been secured for the location of plant, which will be equipped with machinery for the manufacture of rough pottery; electrically operated; also has purchased sufficient clay in beds to last for 20 years.

Augusta, Ga.—Printery.—Thomas E. Billings and Thomas D. Murphy have incorporated the Chronicle Job Printing Office with \$25,000 capital stock and privilege of increasing to \$100,000.

Augusta, Ga.—Ice and Coal Company.—Independent Ice & Coal Co. has been incorporated by Abe Ellis and Stewart Phinlay with \$5000 capital stock and privilege of increasing to \$50,000.

Columbus, Ga.—Furniture Company.—Dodd-Whittlesey Furniture Co. has been incorporated with an authorized capital stock of \$25,000 by L. Dodd, J. H. Whittlesey and W. P. Whittlesey.

Covington, Ga.—Street Improvements.—City will vote on the issuance of \$15,000 of bonds for improving streets. Address The Mayor.

Fitzgerald, Ga.—Steam Laundry.—Domestic Laundry Co. has been organized with Lon Dickey, president; W. L. Smith, secretary-treasurer. (Referred to December 20.)

Gainesville, Ga.—Publishing.—Gainesville Publishing Co. has been incorporated with \$10,000 capital stock and privilege of increasing to \$25,000 by J. O. Adams and associates. (Referred to December 20.)

Helena, Ga.—Saw and Planing Mill.—Helena Lumber Co. has been formed by W. F. Luckie and J. A. Hall to erect sawmill 20x110 feet, and planing mill, size not determined.*

Macon, Ga.—Steam Logging and Railroad Construction.—Chambers Contracting Co. is the correct title of company reported incorporated December 20. It is proposed to act as railroad and steam logging contractors, but at present operations are confined to steam logging. J. H. Chambers is president; J. M. Chambers, vice-president, and J. S. Chambers, secretary-treasurer; offices at Macon and Beech Hill, Ga.

Macon, Ga.—Land Improvement.—J. W. Cabanias, Henry Horne, H. F. Haley, J. T. Nyhan and Julius A. Horne of Milledgeville, Ga., have purchased 77 acres of land adjacent to the city, which will be developed as

suburban residence site, dividing into 300 building lots.

Monroe, Ga.—Cotton Mill.—Walton Cotton Mill Co., mentioned last week, has completed the erection of buildings, enabling it to install machinery that will double its present plant of 5000 spindles and 160 looms. Contracts for new equipment have been placed and the machinery will soon be in position.

Thomasville, Ga.—Street Paving.—Georgia Engineering Co., Augusta, Ga., has contract at \$2.19 per square yard for vitrified brick and 45 cents a lineal foot for curbing for paving six blocks of streets, and W. F. Bowie of Augusta, Ga., at \$1.18 per square yard for laying sidewalks.

KENTUCKY.

Cadiz, Ky.—Hardware.—Chartered: Cadiz Hardware Co., with \$25,000 capital stock, by Ben T. White, J. P. White and G. I. Brandon.

Henderson, Ky.—Hardware, etc.—Norris & Lockett have increased capital stock from \$12,000 to \$25,000.

Hopkinsville, Ky.—Harness Factory.—Chartered: Yost Company, with \$10,000 capital stock, to manufacture harness and deal in vehicles. D. D. Casey is president, and H. A. Yost, secretary-treasurer.

Hopkinsville, Ky.—Electric-light Plant.—Climax Milling Co. has contracted for the installation of electric-light plant.

Knott County, Ky.—Coal and Timber Land. Reported that Samuel Aston and associates of Cleveland, Va., have purchased 6000 acres of coal and timber lands in Knott county, which will be developed.

Lagrange, Ky.—Electric-light Plant.—Reported that a \$10,000 electric-light plant will be established. Charles Sauer, president Commercial Club, can probably give information.

Louisville, Ky.—Land Improvement.—Southern Realty Co. has been incorporated with \$30,000 capital stock by Ed T. Tierney, J. H. Shea and H. C. Neenan.

Louisville, Ky.—Manufacturing.—Foreman-Breen Manufacturing Co. has been incorporated with \$60,000 capital stock by George L. Foreman, W. P. Semple, William A. Robinson of Louisville and E. M. Breen of Maysville, Ky.

Louisville, Ky.—Sewerage.—L. R. Figg is lowest bidder for the construction of two sewers intended to relieve the drainage for the proposed Oak-street subway; estimated cost \$6000.

Louisville, Ky.—Varnish Company.—T. Trammell, H. J. Craig, George H. Brown of Louisville and John R. Nugent of Indianapolis, Ind., have incorporated the Sun Varnish Co. with \$100,000 capital stock.

Louisville, Ky.—Incorporated: E. L. Hughes Company with \$100,000 capital stock by E. L. Hughes, T. R. Brown, W. W. Jett, Jr., and W. D. Jett.

Louisville, Ky.—Land Improvement.—Southern Realty Co. has been incorporated with \$300,000 capital stock by E. T. Tierney, J. H. Shea and H. C. Neenan.

Louisville, Ky.—Baking Powder.—Wright Home Baking Powder Co. has been incorporated with \$10,000 capital stock by Jesse M. Wright, Ella B. Snively, Etta Hast Hays and others.

Maysville, Ky.—Pulley Works.—Ohio Valley Pulley Works has been chartered with \$50,000 capital stock by E. P. Browning, S. P. Browning and T. A. Keith.

Spottsville, Ky.—Coal Mines.—Green River Coal Co. has increased capital stock from \$100,000 to \$125,000. It owns 400 acres of coal lands on Green river which are being developed. William Clendaniel is president and R. L. Biddle secretary, both of Donora, Pa.

LOUISIANA.

Alexandria, La.—Land Improvements.—O'Shee Realty Co. has been incorporated with \$90,000 capital stock. William O'Shee is president; Dennis J. O'Shee, vice-president, and Richard O'Shee, secretary-treasurer.

Alexandria, La.—Sawmill and Timber Land. Reported that J. S. Crowl, J. K. Wadley, R. E. Porter, Will Wadley and E. K. Smith, all of Texarkana, Ark., have secured control of the Ed Rand Lumber Co. Included in the purchase is a sawmill with a daily capacity of 125,000 feet and 200,000,000 feet of standing timber.

Alexandria, La.—Sewerage, Light and Water Systems.—City will vote in January on the issuance of \$25,000 of bonds for the extension of the sewerage, light and water systems to West Alexandria. Address Mayor Turner.

Columbia, La.—Cotton Yard and Warehouse.—Caldwell Union Cotton Yard & Ware-

house Co. has been incorporated with \$5000 capital stock. O. B. Hundley is president; C. P. Bailey, vice-president; J. H. Ferrand, secretary, and R. L. Meredith, treasurer.

Franklin, La.—Oil and Mineral Lands.—Franklin Oil & Mineral Co. has been chartered with \$10,000 capital stock to develop oil and gas fields. J. Sully Martel is president; D. Caffrey, Jr., vice-president; J. G. Martel, secretary-treasurer.

Franklin, La.—Printery.—Chartered: St. Mary Record Printing & Publishing Co., with \$3000 capital stock. T. F. Frere is president; J. G. Martel, vice-president, and Percy Saint, secretary-treasurer.

Franklin, La.—Sugar-cane Cultivation and Refining.—Caffrey & Martel Sugar Co. has been incorporated with D. Caffrey, president; J. Sully Martel, vice-president; F. R. Caffrey, secretary, and J. G. Martel, treasurer; capital stock \$250,000.

Jennings, La.—Agricultural Implements, etc.—Southern Implement Co., Ltd., reported incorporated December 20 with \$15,000 capital stock, has taken over the business of the Calcasieu Implement Co. It is proposed to erect a two-story brick building 80x110 feet in 1907.

Lake Charles, La.—Printery.—Incorporated: Jones Printing Co., with Albert M. Jones, president; Guy Beatty, vice-president, and George W. Brayton, secretary-treasurer; capital stock \$10,000.

Merryville, La.—Timber Development.—Reported that Scott Matthews, formerly of Centralia, Ill.; W. K. Murphy of Pinckneyville, Ill.; C. B. Cole of Chester, Ill.; John R. Jackson of Havana, Ill., and George W. Wall of Duquoin, Ill., have purchased 17,000 acres of land in this vicinity, including a large sawmill now in operation. It is stated that between \$160,000 and \$170,000 was the consideration.

Morgan City, La.—Ship Channel.—W. B. Reed, New Orleans, La. (reported October 4 as making surveys for deep-water channel to be constructed by the Atchafalaya Bay Ship Channel Co. from the mouth of the Atchafalaya, below Morgan City, to the Gulf), has completed surveys and filed plans, specifications and blueprints with estimates, showing that a channel 300 feet wide and 14 feet deep would cost about \$250,000, and a channel 100 feet wide of the same depth will cost \$150,000.

New Orleans, La.—Land Improvement.—Leona Realty Co. has been incorporated with \$25,000 capital stock by Jacob Bloom, Julius Cohn and Joseph Cohn, Jr.

New Orleans, La.—Stone Quarry.—Chartered: Southern Stone Co. with \$250,000 capital stock. John M. Dresser is president and William H. Junk vice-president.

New Orleans, La.—Sheet-Iron Works.—Hautman-Loeb Company, Ltd., has purchased the machinery and leased the building formerly occupied and operated by M. D. Lagan, Ltd., and will begin operations at once.

New Orleans, La.—Land Improvement.—Independent Realty Co. has been incorporated with an authorized capital stock of \$50,000. Felix R. Watts is president; Marguerite R. Watts, vice-president, and Don Fred Watts, secretary-treasurer.

Shreveport, La.—Mill and Elevator.—Chartered: Hamiter-Busby Mill & Elevator Co., Ltd., with \$250,000 capital stock. W. E. Hamiter is president; J. L. Busby, vice-president, and R. L. Holston, secretary.

Shreveport, La.—Oil and Gas Wells.—Dixon Oil & Pipe Line Co., recently organized with S. H. Hunter, president, has purchased at \$26,500 the Cline plantation in the Caddo oil field and will arrange at once for developing oil and gas wells.

Shreveport, La.—Plumbing.—Dillenberger Plumbing Co., Ltd., has been incorporated with \$10,000 capital stock. H. Dillenberger, Jr., is president; George Dillenberger, vice-president, and C. B. Anderson, secretary-treasurer.

MARYLAND.

Baltimore, Md.—Factory.—George Clothier, Jr., architect, Hoffman Building, 11 East Lexington street, has prepared plans and specifications for factory building to be erected on Ridgely street near Bayard; one story, 128x130 feet; steel frame and corrugated iron exterior; cost about \$5000.

Baltimore, Md.—Supplies.—The Kinsonia Supply Co. has been incorporated with capital of \$90,000 to deal in general merchandise and supplies by J. Edward Tyler, Jr., 404 Fidelity Building, Charles and Lexington streets; Robert Burham, Wm. E. Ferguson, R. B. Dourall and Ward B. Coe, 404 Fidelity Building.

Baltimore, Md.—Boiler-room.—William E.

Hooper & Sons Company, cotton manufacturers, Maryland Life Building, 8 and 10 South street, has awarded contracts to McLaughlin Bros., 100 East Lexington street, for the construction of one-story boiler-room, 37x47 feet, at its plant at Woodberry.

Easton, Md.—Electric-light Plant.—As the city is unable to secure satisfactory terms from private electric company which has previously furnished lights, the installation of a municipal plant is under consideration, and Williams, Proctor & Potts, New York, N. Y., have been ordered to prepare plans and specifications, this firm having recently made surveys looking to a possible sewer system, both questions to be submitted to a vote of the people. The granting of a franchise carrying with it a contract for lighting the town will also be considered. Martin M. Higgins is Mayor.

Emmitsburg, Md.—Overall and Shirt Factory.—Emmitsburg Manufacturing Co., reported incorporated December 20 with \$5000 capital stock to manufacture shirts, overalls, etc., has secured building and will install machinery for a weekly output of 500 dozen.

MISSISSIPPI.

Ackerman, Miss.—Cannery.—S. R. Houston and others have incorporated the Ackerman Canning Co. with \$10,000 capital stock.

Bentonla, Miss.—Drug Company.—Chartered: Bentonla Drug Co. with \$20,000 capital stock by J. E. Stewart, N. J. Stewart and others.

Crystal Springs, Miss.—Furniture Company.—Biggs-Clover Furniture Co. has been incorporated with \$10,000 capital stock by W. E. Biggs, J. E. Clover, P. L. Biggs and others.

Hattiesburg, Miss.—Land Improvement.—Colonial Building & Realty Co. has been incorporated with \$60,000 capital stock by H. A. Camp, Joe Shelby and R. S. Hall.

Lauderdale, Miss.—Land Improvement and Clay Mining.—Lauderdale Clay Products & Health Resort Co., Ltd., has been organized with \$500,000 capital stock. It is proposed to purchase 1370 acres of land near Lauderdale, on which is located townsites, and the company will promote and conduct industries located thereon and develop 500 acres of clay lands. Arthur Hauch, 2436 St. Peter street, New Orleans, La., and J. H. Rives, Meridian, Miss., are interested.

Natchez, Miss.—Crate Factory, etc.—Natchez Package Co., reported incorporated December 20 with \$10,000 capital stock, will manufacture fruit crates, trunk slats, shingles, etc.; daily capacity will probably be about 25,000 trunk slats and 700 crates.

Natchez, Miss.—Reservoir.—Reported that a wooden reservoir of 150,000 gallons capacity will be constructed, and Krumbhaar & Aiken, New Orleans, La., are designing engineers.

Richey, Miss.—Land and Manufacturing Company.—Braddock-McGregor Land & Manufacturing Co. has been incorporated with \$10,000 capital stock by Wm. M. Ford, Harry C. Ford, Charles McGregor and others of New Harmony, Ind.

Wesson, Miss.—Cotton Mill.—The New Mississippi Mills has been organized with capital stock of \$500,000 and a bond issue of \$300,000 to take over and continue the operation of the Mississippi Mills—16,496 spindles and 611 looms; officers—president, John H. Fulton; vice-president, R. M. Wainsley; secretary-treasurer, Albert Baldwin, Jr., all of New Orleans, La.

MISSOURI.

Alba, Mo.—Zinc and Lead Mines.—McLanahan Mining Co., reported incorporated last week with \$60,000 capital stock, will mine zinc and lead ore. An ore crushing and dressing mill will be erected. About \$12,000 will be invested. No equipment is needed.

Cape Girardeau, Mo.—Sewerage System.—City will let contract February 4 for constructing complete sewer system for Sewer District No. 1; Granby Jackson, Nashville, Tenn., engineer; George E. Chappell, City Clerk.*

Carthage, Mo.—Lead and Zinc Mines.—Cathedral Mining & Smelting Co. of New York, organized with \$1,500,000 capital stock, has purchased several leases in this district and will arrange at once for beginning mining operations and the erection of five new mills of 500 tons daily capacity. S. F. B. Morse of New York, N. Y., is president of the company and James P. Newell of Carthage vice-president.

Carthage, Mo.—Powder Plant.—Independent Powder Co. is erecting additional buildings and doubling the capacity of plant.

Kansas City, Mo.—Land Improvement.—Spellman Land & Securities Co. has been incorporated with \$30,000 capital stock by C. I.

Spellman, Edward O. Spellman and Lurania Spellman.

Kansas City, Mo.—Machine Works.—Bauer Machine Works Co. has increased capital stock from \$5000 to \$50,000. It is proposed to erect addition to building.

Kansas City, Mo.—Hardwood Mill.—Penrod Walnut Corporation is enlarging plant and increasing the capacity. A building 60x64 feet and one 100x40 feet, each one story, are being erected to be used as veneer works, and machinery will be installed with a capacity of 100,000 feet of walnut veneer daily.

Kansas City, Mo.—Viaduct Elevator Plant. Kansas City Viaduct & Terminal Railway Co. is arranging for the installation of elevators to lift teams from the level of the street to the level of the viaduct. Viaduct platforms are 11 feet wide and 23 feet long and have 16 feet clear headroom; enclosed on all sides and equipped with automatic doors at the landings; the elevator is started by a push-button and stops automatically, and the stopping opens the doors. It is proposed to install two such plants, one to contain eight elevators.

Kansas City, Mo.—Lumber Company.—Incorporated: Terry Lumber Co., with \$30,000 capital stock, by James C. Noll, C. H. Terry, L. M. Noll and others.

Kansas City, Mo.—Construction Company.—Military Construction Co. has been incorporated with \$36,000 capital stock by Richard C. Menefee, Benjamin R. Estill and George H. English, Jr.

Kansas City, Mo.—Bridge Construction.—Incorporated: Union Bridge & Construction Co. with \$50,000 capital stock by L. S. Stewart, Lee Treadwell, Clarence A. Neal and others.

Kansas City, Mo.—Motor Cars.—E. L. De Camp Motor Car Co. has been incorporated with \$10,000 capital stock by E. L. De Camp, D. B. Munger and A. H. Munger.

Rolla, Mo.—Water works.—Contract will be let January 7 for the construction of water works, for which \$50,000 of bonds were reported October 4 as voted; McRae & Harris engineers in charge.*

St. Louis, Mo.—Hat Factory.—Gauss-Langenberg Hat Co. has been incorporated with \$300,000 capital stock by Charles F. Gauss, Frederick J. Langenberg, Samuel H. Young and others.

St. Louis, Mo.—Irrigation Company.—Walker Evans, Jr., Oscar B. Strunk, Richard R. Brooks and others have incorporated the Rio Grande Irrigated Land Co. with \$100,000 capital stock.

St. Louis, Mo.—Kindling and Kindling Material.—American Kinder Co. has incorporated with \$25,000 capital stock to manufacture kindling and kindling material; incorporators, Andrew Sandelin, William Gruendler, Joseph Mattman, Charles E. Heinrich and Edward Patke.

St. Louis, Mo.—Gas Machinery.—International Gas Power Co., organized with \$600,000 capital stock, will take over the Parker Producer Gas Co. It will specialize in the manufacture of machinery for the production of gas for power purposes; by its system tar is extracted without mechanical means. E. P. Snowden of St. Joseph, Mo., is president and general manager; A. T. Averill of Cedar Rapids, Iowa, vice-president; Charles Webster of Minneapolis, Minn., second vice-president and treasurer; W. D. Rusk of St. Joseph, Mo., secretary; F. J. Millar, consulting engineer, in charge of Chicago office at 550-551 Monadnock Block.

St. Louis, Mo.—Chemical Works.—Kilpstein Chemical Co. has been incorporated with \$5000 capital stock by Theodore A. Kilpstein, Ida Kilpstein and William A. Dillon.

St. Louis, Mo.—Cast-steel Blocks.—Chartered: Cast Steel Bufling Block Co., with \$20,000 capital stock, by Frank L. Morey, O. T. Ledford and A. F. Morey.

St. Louis, Mo.—Fender Frames.—Locomotive Fender Frame Co. has been incorporated with \$30,000 capital stock by Frank L. Morey, O. T. Ledford and A. F. Morey.

St. Louis, Mo.—Lumber Company.—Ferguson-McLaris Lumber Co. has been incorporated with \$75,000 capital stock by John D. Ferguson, Charles M. McLaris, Frederick A. Goodrich and T. F. Chapin, all of St. Louis, and John E. Crawford of Oklahoma City, O. T.

St. Louis, Mo.—Cooperage.—Brueckmann Cooperage Co. has been incorporated with \$25,000 capital stock by George Brueckmann, John G. Brueckmann and Charles F. Beardsley.

St. Louis, Mo.—Safe and Lock Works.—H. C. Brenner, Edward A. Sangulnet and Chas. J. Graf have incorporated the Brenner Safe & Lock Co. with \$100,000 capital stock to continue an established business.

St. Louis, Mo.—Automobile Company.—

Amedee B. Cole, R. L. Steele and F. E. Stevens have incorporated the A. B. C. Auto Buggy Co. with \$45,000 capital stock.

NORTH CAROLINA.

Angier, N. C.—Cotton Gin.—Williams Milling Co. will rebuild during the summer of 1907 cotton gin reported burned. It is proposed to erect a frame building, 56x45 feet; J. C. McGee engineer in charge and M. C. Smith architect.

Asheville, N. C.—Timber Development.—Champion Wood Supply Co. has been organized by S. Montgomery Smith to furnish wood for local manufacturing plants. A tract of timber suitable has been purchased and development will begin at once; about 25,000 cords of wood a year will be furnished.

Asheville, N. C.—Road Improvements.—Reported that Buncombe county is considering the issuance of \$250,000 of bonds for road improvements. Address County Clerk.

Bridgersville (P. O. Wilbanks), N. C.—Brick Works, etc.—Bridgersville Stock Co. has been incorporated with an authorized capital stock of \$30,000 by N. W. Wiggins, S. P. Thomas, R. H. Thomas, I. T. Eason, M. D. Forbes, W. H. Robbins, W. R. Wiggins and associates.

Canton, N. C.—Public Improvements.—City is considering issuing \$65,000 of bonds for constructing water-works and sewerage system, paving streets and erecting school buildings. Address Mayor Curtis.

Dallas, N. C.—Shirt Factory.—H. M. Clemmer contemplates establishing shirt factory and wants information.*

Dillsboro, N. C.—Flour and Meal Mill, etc.—Hanson Mill Co., reported incorporated December 20 with \$50,000 capital stock, has purchased and will operate the flour and meal mill of the Dillsboro Milling & Manufacturing Co.; capacity 100 barrels flour and 400 bushels meal. In the spring it is proposed to raise the dam, install another wheel and erect a plant for dressing feldspar, talc, mica and sawing magnesian silicate blocks for furnace linings. W. G. Hanson is president; C. D. W. Colby, secretary.

Franklin, N. C.—Furniture Factory.—C. D. Gunter of Lawrenceville, Ga., and associates are reported to organize stock company to establish furniture factory.

Gold Hill, N. C.—Gold and Copper Mines.—Gold Hill Mining Co., recently incorporated, is developing six acres of gold-mining property on the Gold Hill Copper Co.'s extensions of veins. It is proposed to increase the capital stock from \$100,000 to \$1,000,000. Mining equipment has not been purchased.*

Greensboro, N. C.—Cotton Mill.—Incorporated: Greensboro Manufacturing & Coal Co. with capital stock of \$50,000 for manufacturing cotton goods, ice, etc.; incorporators, W. E. Hackett, A. N. Perkins, W. B. Hunt and W. B. Ross.

High Point, N. C.—Furniture Factory.—Jonas Coreland of Greensboro, N. C., and W. E. Cochran of Pennsylvania, organizers of the American Folding Furniture Co., capitalized at \$50,000, contemplate locating plant at High Point for the manufacture of furniture.

Hillsboro, N. C.—Brick, Drain and Sewer Pipe.—Hillsboro Clay Manufacturing Co. has been incorporated with \$100,000 authorized capital stock by P. C. Collins, A. J. Ruffin, T. N. Webb, N. W. Brown, J. Cheshire Webb and S. Strudwick to manufacture brick, drain and sewer pipe.

Kitchen (not a postoffice), N. C.—Lumber Company.—Kitchen Lumber Co. has been incorporated with \$10,000 authorized capital stock by Charles Kitchen, James Kitchen, both of Leon, Ky.; R. H. Vansant of Ashland, Ky., and Henry B. Stevens of Asheville, N. C.

Newbern, N. C.—Fertilizer Factory and Lumber Mill.—Eastern Chemical & Manufacturing Co. has been incorporated with \$25,000 authorized capital stock by W. E. Pipkin, Edward Smith and J. C. Brown.

Oxford, N. C.—Cannery.—Allen-Harris Company with \$2500 capital stock and privilege of increasing to \$25,000 by E. T. Allen, I. H. Harris, T. C. Harris and J. F. White.

Raleigh, N. C.—Telephone System.—Capital City Telephone Co. has applied for telephone franchise. If franchise is secured, arrangements will be made at once for the erection of exchange building.

Rockingham, N. C.—Water-power Electrical Plant.—The Rockingham Power Co. is now constructing a cofferdam in connection with its water-power developments at Bluff Falls, near Rockingham. It has begun the construction of the main dam, which will be 1650 feet long and 45 feet high; behind this wall will be built the power station to contain the hydraulic and electrical machinery. This company has been referred to several

times, and principal details were stated on July 19. It expects to develop about 30,000 horse-power for transmission by electricity to Wadesboro, a distance of 12 miles; Rockingham, 9 miles; Hamlet, 14 miles; Laurinburg, Gibsons Mills and other cities. The Federal Construction Co., 33 Federal street, Boston, Mass., is supervising the construction; Messrs. Lockwood, Greene & Co. of Boston, Mass., are engineers in charge; the General Electric Co. of Schenectady, N. Y., has contract for the electric machinery and the S. Morgan Smith Company of York, Pa., has contract for the hydraulic equipment. Messrs. W. R. Bonsal & Co. of Wilmington, N. C., have contract under the Federal Company for dam construction and other work. The Rockingham Power Co.'s president is M. F. H. Gouverneur of Wilmington, N. C., and Messrs. Hugh MacRae & Co. of Wilmington are financially interested. New York offices of Rockingham Power Co. are with the Rockingham Contracting Co. at 62 Cedar street.

Rocky Mount, N. C.—Furniture Factory.—A company is being organized with \$50,000 authorized capital stock to manufacture furniture and engage in a mill and lumber business. Machinery will be purchased. A. W. Robbins is promoting the enterprise.*

Snow Hill, N. C.—Publishing.—Snow Hill Publishing Co. has been incorporated with an authorized capital stock of \$25,000.

Taylorsville, N. C.—Sawmill, etc.—Everhart Lumber Co., reported incorporated December 20 with \$25,000 capital stock, will manufacture rough and finished pine lumber; daily capacity 10,000 feet. A packing-box factory will probably be established. C. L. Everhart is vice-president and superintendent and H. C. Everhart secretary-treasurer.*

Vaughn, N. C.—Hosiery Mill.—Vaughn Hosiery Mills has been incorporated with capital stock of \$25,000 by R. S. Spiers of Vaughn, E. W. Thompson of Macon, N. C., and others; this company previously reported as organized and established plant of 50 machines, with dyehouse.

Wake Forest, N. C.—Supply Company.—O. K. Holding, I. O. Jones and R. A. Freeman have incorporated the Wake Forest Supply Co. with \$25,000 authorized capital stock.

Wilmington, N. C.—Shingle, Cooperage and Veneer Works.—The plant of the Atlantic Shingle, Cooperage & Veneer Co. has been purchased at \$17,500 by A. H. Slocumb of Fayetteville, N. C., its former president, and it is stated arrangements will be made at once for beginning operations.

Wilson, N. C.—Gas Plant.—J. C. Hales, Geo. W. Connor and G. D. Green have been appointed a committee to investigate the advisability of establishing a municipal gas plant.

Wilson, N. C.—Gas Plant.—Business Men's Association at a meeting recently held adopted resolutions looking to the establishment of a modern gas plant. J. C. Hales is made chairman of committee on investigation.

Winston-Salem, N. C.—Drug Company.—Owens Drug Co. has increased capital stock from \$7500 to \$25,000.

SOUTH CAROLINA.

Abbeville, S. C.—Lumber Company.—Abbeville Lumber Co. has been incorporated with \$10,000 capital stock by J. M. Lawton and C. S. Sanford of Abbeville and F. A. Lawton of Greenville, S. C.

Anderson, S. C.—Cotton Mill.—The Toxaway Mills has awarded contract for 5000 spindles and 125 looms additional, and this new machinery is now being installed; referred to last week.

Anderson, S. C.—Street Improvements.—City will issue \$75,000 of bonds for sidewalk improvements, mentioned last week. J. L. Sherard is City Clerk.

Bishopville, S. C.—Electric-light and Power Plant.—City has not as yet closed trade for the purchase of the plant of the Bishopville Light & Power Co., recently referred to. J. C. Rhann is Clerk.

Blacksburg, S. C.—Drug Company.—R. C. Garland of Gaffney, S. C., and W. J. Roberts of Shelby, N. C., have incorporated the Garland Drug Co. with \$7000 capital stock.

Charleston, S. C.—Cotton Mill.—Royal Bag & Yarn Manufacturing Co. has awarded contracts for 2500 spindles additional and the accompanying carding machinery; increase gives total equipment of 10,000 spindles and 320 looms.

Charleston, S. C.—Portland-cement Plant.—Standard Portland Cement Co. has increased capital stock from \$125,000 to \$150,000. Arrangements are being made to double the output of the plant, giving a daily capacity of about 1500 barrels.

Clio, S. C.—Chartered: Covington Company, with \$30,000 capital stock, by J. C. Covington, T. G. Covington, H. C. Anderson and N. M. Carmichael.

Gaffney, S. C.—Machinery Manufacturing.—J. L. Daniels, who recently patented a machine to utilize the cotton stalk by grinding it and making a fiber out of the bark and a pulp for making paper out of the inside, is organizing a company with \$5000 capital stock to build the machines and place them on the market.

Lexington, S. C.—Bottling Works.—Chartered: Mathias Spring Bottling Co. has been incorporated with \$5000 capital stock by W. W. Hawkes, T. C. Sturkie and others.

Orangeburg, S. C.—Sewerage System.—City will let contract January 23 for the construction of sewerage system. Thos. C. Doyle is chairman of Board of Sewerage Commissioners.*

Pacolet, S. C.—Cotton Mill.—It is reported the Pacolet Manufacturing Co. will build an addition 107x110 feet in size in order to provide space for more machinery. This company is about completing its Mill No. 5, containing 27,000 spindles and 1000 looms, under construction during the past year.

Sumter, S. C.—Sewerage System.—City has voted affirmatively the \$50,000 bond issue reported December 6 to be voted for constructing sewerage system. J. L. Ludlow, Winston-Salem, N. C., is engineer in charge.

TENNESSEE.

Alton Park, Tenn.—Spoke Works.—Frank E. Milburn, reported last week as having purchased the Lion Spoke Works, will operate as the Milburn Spoke Works; daily capacity 4000.

Carthage, Tenn.—Bridge Construction.—W. T. Young Bridge Co., Nashville, Tenn., has contract at \$14,635 for the erection of bridge across the Caney Fork river, recently referred to.

Chattanooga, Tenn.—Woolen Mills.—American Textile Woolens Co. will be organized with capital stock of \$2,500,000 to take over the Park Woolen Mills, Rossville, Ga.; Louisville (Ky.) Woolen Mills, Sweetwater (Tenn.) Woolen Mills, Athens (Tenn.) Woolen Mills and the Atlanta (Ga.) Woolen Mills. These plants have 26,784 spindles and 1272 looms, manufacturing principally jeans. Probably W. M. Nixon of Atlanta will be president, and F. A. Carter of Sweetwater, secretary; to locate main offices in Chattanooga.

Chattanooga, Tenn.—Land Improvement.—G. H. Miller and associates have purchased 88 acres of land in East Chattanooga, which will be developed as residence suburb.

Chattanooga, Tenn.—Dairy.—Sprague Dairy Co. has increased capital stock from \$50,000 to \$75,000.

Chattanooga, Tenn.—Public Improvements.—City will vote on a \$1,000,000 bond issue for public improvements, to include the issuance of \$50,000 sewerage, \$250,000 street, \$100,000 floating-debt, \$50,000 park, \$200,000 city-hall and \$50,000 fire-hall bonds. Robert Hooke is City Engineer.

Chattanooga, Tenn.—Shirt Factory.—Hamilton Manufacturing Co. has been incorporated with \$10,000 capital stock to establish shirt factory. Buildings 517-519 West 9th street have been secured and machinery will be installed at once. B. Benkovitz is president; Samuel Baron, vice-president, and S. Edelstein, secretary-treasurer.

Chattanooga, Tenn.—Iron and Bolt Works.—Reported that the Illinois Iron & Bolt Co. of Carpentersville, Ill., has purchased 40 acres of land near East Lake and will expend \$400,000 in the establishment of plant.

Dickson, Tenn.—Iron Furnace.—Reported that the Dickson Land & Improvement Co. is arranging to erect iron furnace.

Knoxville, Tenn.—Street Paving.—Contract for laying granolithic paving in Piedmont Place addition has been let to Joseph Armstrong and calls for between 1500 and 2000 linear yards of sidewalks.

Memphis, Tenn.—Coffin Factory.—J. M. Hill, W. H. Gibson, J. H. Thurman, R. Blanton and Chester Bryan have incorporated the Bluff City Coffin Co. with \$30,000 capital stock.

Memphis, Tenn.—Ice-cream Factory.—Memphis Ice Cream Co. has been incorporated with \$10,000 capital stock by F. W. Bauman, G. L. Longbain, Charles H. Auferoth, H. W. Bauman and O. W. Black.

Nashville, Tenn.—Harness Goods.—Southern Stamping Co. has incorporated with \$5000 capital stock to manufacture harness goods, ornaments, suspender buckles, etc.; incorporators, E. S. Shannon, Sheffield Clark,

J. L. McWhorter, L. R. Eastman and W. G. Greenleaf.

TEXAS.

Brownwood, Texas.—Cottonseed-oil Mill.—N. A. Perry of Brownwood and Winfield Scott of Fort Worth, Texas, will erect a cottonseed-oil mill.

Bryan, Texas.—Cotton Compress.—Planters' Compress Co., recently organized, has secured site on which to locate proposed compress.

Denison, Texas.—Street Paving.—City is considering issuing \$20,000 of bonds for paving Main street. Address The Mayor.

Fort Worth, Texas.—Wire-fence Factory.—The report mentioned December 13 that the Adrian (Mich.) Wire Fence Co. contemplated establishing plant in Fort Worth is not correct. However, the establishment of plant for the manufacture of wire fencing is being contemplated by parties who are negotiating with W. W. Cooke, president of the Adrian Wire Fence Co., for the use of his patents.

Franklin, Texas.—Mineral and Oil Wells.—Franklin Mineral & Oil Wells Co. of Franklin and Fort Worth, Texas, has been incorporated with \$50,000 capital stock by J. V. French, W. W. Jordan, William R. Booth, M. H. Cook and Hudson Boatner.

Gonzales, Texas.—Chartered: Fisher Bros. Baker Company, with \$50,000 capital stock, by W. P. Fisher, F. B. Baker, W. H. Clark, W. H. Ramsay and E. J. Arnim.

Hamlin, Texas.—Incorporated: Pool-Whittington Company, with \$50,000 capital stock, by Wm. A. Whittington, J. C. Bryant and J. P. Pool.

Houston, Texas.—Car Works, Iron and Steel Works, etc.—Reported that the establishment of a plant to manufacture railroad cars is projected by Edwin F. Goltra and James Campbell of St. Louis, Mo.; B. F. Yoakum of New York, N. Y., and John H. Kirby of Houston, Texas. The establishment of iron and steel plant to be operated in connection is also being considered.

Houston, Texas.—Show-case Factory.—Houston Show Case Co. has increased capital stock from \$20,000 to \$35,000. It is stated the plant will be enlarged and capacity increased.

Houston, Texas.—Land Improvement.—Pickert-Hammond Lumber Co. has been incorporated with \$100,000 capital stock by Fred C. Pickert, W. H. Hammond and Charles T. Lawton.

Houston County, Texas.—Timber Land.—Reported that F. H. Peters and associates of Fort Worth, Texas, have purchased 8000 acres of hardwood timber land in Houston county at \$55,000. It is proposed to cut the timber and cultivate the land.

Marshall, Texas.—Street Paving.—City is reported as considering issuing \$100,000 of bonds for street improvements. Address The Mayor.

New Braunfels, Texas.—Water Supply.—The city has voted to purchase the Comal river springs, with a flow of about 2,000,000 gallons of water in 24 hours, and 20 acres of land. It is proposed to use this as a source of supply, furnishing the city with water. Address The Mayor.

Nordheim, Texas.—Land Improvement.—Nordheim Town Co. has been incorporated with \$12,000 capital stock by Emil Reiffert, William Probes, Pauline Mugge, Henry A. Mugge and Walter Reiffert, all of Cuero, Texas.

Ozona, Texas.—Chartered: L. B. Cox Company, with \$40,000 capital stock, by L. B. Cox, J. W. Odom and W. D. Barton.

Princeton, Texas.—Wilson-Miller Company has been incorporated with \$10,000 capital stock by John W. Wilson, Ben Wilson and S. O. Miller.

Rockwell, Texas.—Mattress Factory.—Ostrich Mattress Co. has been incorporated with \$10,000 capital stock by W. C. Bishop, E. D. Foree, I. J. Austin, all of Rockwall; J. W. Hoover of Fort Worth, Texas, and J. W. Adison of Ennis, Texas.

San Antonio, Texas.—Transfer Company.—Incorporated: Union Transfer Co., with \$5000 capital stock, by John A. O'Connor, Albert P. Searle and W. C. Williams.

San Angelo, Texas.—Ice and Power Plant.—San Angelo Ice & Power Co. has increased capital stock from \$30,000 to \$60,000.

San Antonio, Texas.—Incorporated: Hot Wells Company with \$250,000 capital stock by L. Lytle, Walter P. Napier of San Antonio and L. M. Putnam of Oklahoma City, O. T.

San Antonio, Texas.—Mining and Milling.—Sinaloa Mining & Milling Co. has been incorporated with \$50,000 capital stock by J. C.

Butterfield, E. W. Tynan, George Ogee and Charles B. Bertrand.

Seguin, Texas.—Road Improvement.—Guadalupe county is reported as to issue \$50,000 of bonds for road improvements. Address County Engineer.

Sherman, Texas.—Oil Refinery.—Sherman Refining Co., recently organized, will operate cottonseed-oil refinery having a daily capacity of 800 barrels. J. C. Tassej is general manager. (Referred to December 20.)

Strawn, Texas.—Electric-light and Ice Plants.—George E. Bennett, president Mt. Marion Coal Mining Co., will install a 600-light electric plant and an ice plant.

Temple, Texas.—Bridge Construction.—Commissioners' Court of Bell county will arrange for the issuance of \$20,000 of bonds for replacing and repairing bridges in the county.

VIRGINIA.

Alexandria, Va.—Watchman's Clock.—Williams Watchman's Clock Co. has been incorporated with \$500,000 capital stock to manufacture watchmen's clocks, etc. H. H. Darneille is president; C. W. Darr, vice-president, and F. S. Norton, secretary-treasurer.

Bristol, Va.—Building Stone and Building Material.—Ideal Building Stone Co. has been incorporated with an authorized capital stock of \$10,000. J. C. Byars of Bristol is president; W. T. Tiller of Emporia, Va., vice-president, and L. A. Palmer of Abingdon, Va., secretary-treasurer.

Buell, Va.—Wood-preserving Company.—United States Wood Preserving Co. is arranging for the establishment of plant at Buell. It is stated the company will utilize 10 acres of land, erecting a plant costing \$500,000. The capital stock of the company is now \$400,000, but, as it is anticipated enlarging the capacity of the plant, the capital stock will be increased.

Fincastle, Va.—Mining.—Botetourt Mineral & Mining Co. has been incorporated with F. G. Woodson, president; Turner McDowell, secretary-treasurer; authorized capital stock \$50,000. The company is now mining ore and expects to increase its output.

Lawrenceville, Va.—Hardware.—Thomas Hardware Co. has been incorporated with \$25,000 authorized capital stock. C. W. S. Thomas is president; C. R. Elam, vice-president and W. G. Jackson, secretary-treasurer.

Lynchburg, Va.—Iron Foundry.—At a meeting of the stockholders of the Lynchburg Foundry Co. it was decided to make the authorized capital stock \$500,000, of which \$300,000 will be common stock and \$200,000 preferred stock. The present paid-up capital is \$350,000.

Marion, Va.—Drug Company.—D. M. Smith Drug Co. has been incorporated with \$10,000 capital stock. D. M. Smith is president; S. H. Wolfe, vice-president, and W. M. Slater, secretary-treasurer.

Norfolk, Va.—Band Improvement.—Chartered: Flat Iron Square Locality Corporation, with \$100,000 capital stock. W. B. Baldwin is secretary-treasurer.

Norfolk, Va.—Foundry and Machine Shop.—Southern Foundry & Machine Corporation has been chartered with R. A. Wainwright, president, and C. M. Tunstall, vice-president.

Norfolk, Va.—Novelty Works.—National Novelty Co. has been incorporated with Fred B. Hill, president; H. R. Vesey, vice-president, and John Upton, secretary-treasurer; capital stock \$15,000.

Norfolk, Va.—Land Improvement.—Simpson Land Corporation has been chartered with an authorized capital stock of \$50,000. R. F. Hanbury is secretary-treasurer.

Norfolk, Va.—Land Improvement.—McDonald Lumber Co. has been incorporated with an authorized capital stock of \$50,000. Percy Williams is president; George Lindsay, vice-president, and George Pilcher, secretary-treasurer.

Norfolk, Va.—Lumber Company.—Jordan Brothers Lumber Co. has been incorporated with \$25,000 authorized capital stock. W. P. Jordan, Jr., is president and treasurer; J. T. Deal, vice-president, and C. M. Jordan, secretary.

Norfolk, Va.—Lumber Company.—Henderson-Jarrett Company has been incorporated with \$25,000 authorized capital stock. J. H. Jarrett, Springfield, Mo., is president; Cleveland Henderson, Norfolk, vice-president.

Norfolk, Va.—Paint Company.—Chartered: Dolphin Paint Corporation with James Iredell Jenkins, president and treasurer; C. A. McLean, vice-president, and Ed Riddick, secretary; authorized capital stock \$30,000.

Norfolk, Va.—Ice-cream and Candy Factory.—Chartered: Ice Cream Cone Corporation, with \$12,000 capital stock. M. Levy is

vice-president; J. L. Huband, secretary, and W. A. Moore, treasurer.

Norfolk, Va.—Marine Railway.—Norfolk Marine Railway has been incorporated with George P. Hudson, president; George W. Roper, vice-president; W. B. Roper, secretary, and R. H. Dawson, treasurer; capital stock \$185,000. (Referred to December 20.)

Norfolk, Va.—Street Paving.—Sands, Lawson & Key have contract at \$29,000 for paving Church street through Huntersville to the Norfolk & Western Railway tracks.

Norfolk, Va.—Brewery.—Consumers' Brewing Co. is considering making extensive additions, and will issue \$100,000 of bonds.

Norfolk, Va.—Boulevard.—Denby Grading Co. has contract at 25 cents a cubic yard for grading the city end of the boulevard.

Petersburg, Va.—Cigar Factory.—American Tobacco Co. has purchased site 217x100 feet on which to erect proposed cigar factory.

Richmond, Va.—Bakery.—L. Bromm Baking Co. has been incorporated with \$35,000 capital stock. Charles H. Bromm is president; E. A. Bromm, secretary, and J. J. Mattern, treasurer.

Richmond, Va.—Paint Company.—Chartered: Sanders Bros. Company, with an authorized capital stock of \$50,000. Owsley Sanders is president; Adair H. Sanders, vice-president, and John H. Cecil, secretary.

Richmond, Va.—Candy Factory.—Gathright-Chiles Company has been incorporated with \$50,000 capital stock. R. L. Gathright is president; J. C. Crump, vice-president, and W. D. Chiles, secretary-treasurer.

Roanoke, Va.—Lumber and Building Material.—Virginia Lumber Manufacturing Co. has been chartered with R. H. Angell, president; Lena Woodley, secretary-treasurer.

Roanoke, Va.—Water-power Electrical Plant.—James River Water-Power Co. has been organized to develop the water-power of the James river at Little Tunnel. It is proposed, as soon as all the property desired is obtained, to build a dam across the James river and install an electric plant for transmitting the power to Roanoke. Fincastle, Clifton Forge and Buchanan, Va.

Roanoke, Va.—Sewerage.—W. B. Bates, City Engineer, it is reported, has completed plans for a sewer system in what is known as the Jeanette addition and the Gish farm.

Spottsylvania, Va.—Telephone System.—Spottsylvania Telephone Co. has been incorporated with an authorized capital stock of \$10,000 by G. W. Perry, J. P. H. Crismond, T. A. Harris, T. W. Dew, W. B. Warren, C. R. Coleman and associates.

Staunton, Va.—Stove Foundry.—Reported that D. R. Eskey, proprietor of the Virginia Lighting Conductor, Stove & Steel Range Co., Winchester, Va., will establish branch factory.

Virginia Beach, Va.—Sewerage, Water-works and Street Improvements.—James E. Riddle, civil engineer, Norfolk, Va., has been selected as engineer in charge of the installation of sewers, water-works and paving work, for which bonds were reported December 6 as voted.

WEST VIRGINIA.

Charleston, W. Va.—Bridge Construction.—Penn Bridge Co., Beaver Falls, Pa., has contract to construct bridge over the Elk river, referred to November 29.

Clarksburg, W. Va.—Glass Factory.—Clarksburg Opalescent Glass Works has been incorporated with \$30,000 capital stock by J. M. Francoise, E. J. Francoise, John C. Francoise, E. L. Spraker and J. F. Bonnett, to continue an established business.

Clarksburg, W. Va.—Coal Mines and Coke Ovens.—Summit Coal & Coke Co. has been incorporated with \$50,000 capital stock by H. R. Miller, H. A. Gibbansky, both of Pittsburgh, Pa.; Frederick Brandt of Detroit, Mich.; Thomas P. Richey of Allegheny, Pa., and Robert D. McKeon of Columbus, Ohio.

Cowen, W. Va.—Coal and Timber Land.—Birch River Coal & Coke Co. has been organized with \$100,000 capital stock by C. B. Couch, J. M. Connihay, E. A. Reid, A. S. Alexander and Murray Briggs, all of Charleston, W. Va., to develop coal and timber lands.

Fairmont, W. Va.—Drug Company.—Homer Hall, Jesse H. Rex, Hugh Harn, R. A. Watts and Joseph Lehman have incorporated the Mountain City Drug Co. with \$20,000 capital stock.

Fairmont, W. Va.—Bridge Construction.—Fairmont & Clarksburg Traction Co. is arranging for the erection of a bridge across the Monongahela river. A. T. Watson, offices with the Fairmont Coal Co., Continental Trust Building, Baltimore, Md., is purchasing agent.

Grafton, W. Va.—Coal Mines.—Chartered: Western Maryland Coal Co., with an authorized capital stock of \$24,000, by J. G. Wolfe of Grafton, C. E. Conaway of Fairmont, W. Va.; Samuel D. Brady of Parkersburg, W. Va.; B. F. Overholt of Scottsdale, Pa.

Hallsville, W. Va.—Coal Mines.—Reported the Superior Pocahontas Coal Co., which recently acquired the Davy Crockett and Helena property, has expended about \$100,000 in improvements preparatory to mining coal, which it contemplates by February 1. Two tipples are in course of construction, as well as miners' houses, one mile of standard-gauge track, etc.

Hampshire (not a postoffice), W. Va.—Coal Mines.—Masteller Coal Co., which is developing coal mines near Hampshire, is installing a new operation, the New Creek mine, which will have a daily capacity of 500 tons during the next several months; main office, Keyser, W. Va.

Huntington, W. Va.—Furniture Factory.—Probst-Biggs Furniture Co. has been incorporated with \$100,000 capital stock by George N. Biggs, S. G. Biggs, Mrs. S. G. Biggs of Huntington, Lewis Probst, George L. Probst and Charles McKnight of Pomeroy, W. Va.

Huntington, W. Va.—Land Improvement.—James B. Griffiths, J. H. Broyles, W. K. McClure, R. H. Samson of Knoxville, Tenn., and associates have incorporated the Eastern Kentucky Realty Co. with \$100,000 capital stock.

Parkersburg, W. Va.—Ice Plant.—Parkersburg Ice Plant will increase the capacity of plant during the coming year. Thomas Page is secretary.

Philippi, W. Va.—Coal Mines.—Fred O. Blue of Philippi, R. H. Parker, William P. Hurst, E. L. Cunningham of Scottsdale, Pa., and George W. Newcomer of Connellsville, Pa., have incorporated the Newcomer Coal Co. with \$25,000 authorized capital stock.

Wellsburg, W. Va.—Concrete-block Factory.—Freshwater Improvement Co. has been incorporated with an authorized capital stock of \$50,000 by John C. Palmer, Jr., Joseph B. Palmer, S. B. Palmer, Thos. J. Reid and L. M. Darlymple of Wheeling, W. Va.

Wheeling, W. Va.—Steel and Iron Works, Coal Mines, etc.—Wheeling Steel and Iron Works is reported as to arrange for the use of coal at its plants instead of natural gas, as formerly. This will necessitate replacing the gas burners under the boilers with coal furnaces and the installation of one or two additional boilers. It is stated the capacity of the company's coal mines will be increased from 400 tons daily to 700 tons. It is also proposed to extend the yard. The right to build a bridge at 11th street, making this extension possible, was recently secured from the city.

INDIAN TERRITORY.

Dewey, I. T.—Portland-cement Plant.—The plant of the Dewey Portland Cement Co., now under construction, will have daily output of 2500 barrels of cement and be electrically driven, power being furnished from three-phase electric generator direct connected to four 600-horse-power engines; about 50 motors, aggregating 2500 horse-power, will be used, it being the purpose to drive each important machine or apparatus by an individual motor. The main buildings will be of steel and concrete. Bartlett Steel Co., Joplin, Mo., has contract to manufacture and erect all the steel buildings required, and Tyler & Co., Junction City, Kan., are in charge of the construction (mentioned December 13). F. E. Tyler is president and general manager; F. L. Williamson, vice-president; J. B. Keith, secretary, and J. R. Mulvale, treasurer; main office, I. O. O. F. Building, Coffeyville, Kan.

Muskogee, I. T.—Iron and Woodworking Plant.—National Mill & Manufacturing Co. has been incorporated with \$25,000 capital stock by J. T. Halslip, E. L. Bazwell, A. E. Davidge, Alexander Richmond and Leander Hall.

Muskogee, I. T.—Publishing.—Chartered: News Publishing Co., with \$25,000 capital stock, by F. L. Martin, Ira L. Reeves, S. A. Lanning and Frank F. Merriam.

Quinton, I. T.—Hardwood and Handle Factory.—Oklahoma Hardwood & Handle Co. has been incorporated with \$25,000 capital stock by A. W. Jones, J. Monk, W. A. Blair, E. R. Combs and Della G. Jones.

Wynnewood, I. T.—Public Improvements.—City will vote January 18 on the issuance of \$8000 of bonds for extending water-works, building city and fire hall. Address The Mayor.

OKLAHOMA TERRITORY.

Byron, O. T.—Lumber Company.—Chartered: C. O. Vaughn Lumber Co., with \$50,000 capital stock, by C. O. Vaughn, S. H. Conck-

er, J. L. Blanchard of Byron and A. E. Smith of Amorita, O. T.

Capitol Hill, O. T.—Building Company.—Home Building Co. has been incorporated with \$500,000 capital stock by W. K. Ransom of Capitol Hill, D. W. Hogan, W. W. Bierce, F. P. Johnson and J. M. Owen of Oklahoma City, O. T.

El Reno, O. T.—Street Improvement.—Contract will be let December 27 for grading and paving various streets. L. G. Adams is City Clerk.*

Gotebo, O. T.—Gas-pipe line.—New State Gas & Oil Co., which is developing a gas field near Gotebo, will let contract for the construction of a pipe line from the field to Hobart, a distance of 17 miles.

Guthrie, O. T.—Land Improvement.—Merchants' Improvement Co. has been incorporated with \$100,000 capital stock by G. V. Pattison, H. W. Pentecost and L. E. Pentecost.

Hobart, O. T.—Cotton Company.—W. A. Patterson of Hobart, W. F. Roberts and J. K. Patterson of St. Louis, Mo., have incorporated the Patterson Cotton Co. with \$10,000 capital stock.

Mangum, O. T.—Lumber Company.—Independent Home Lumber Co. has been incorporated with \$25,000 capital stock by A. G. Herndon of Mangum, S. D. Bailey, J. C. Brown and M. P. Overholzer of Snyder, O. T.

Oklahoma City, O. T.—Grain Elevator.—Capital Grain Co., recently incorporated, is arranging for the erection of grain elevator, 375x150 feet, to have a capacity of 200,000 bushels, equal to 400 carloads, and cost \$40,000; building to be of frame construction.

Pawhuska, O. T.—Oil Wells.—Graves Oil Co. has been incorporated with \$40,000 capital stock by C. S. McDonald of Pawhuska, Arthur F. Hendren and J. L. Sells of Tulsa, I. T.

Faxon, O. T.—Cement-block Factory.—Faxon Cement Building Co. has been incorporated with \$50,000 capital stock by Jacob F. Puercy, Charles L. Thornton of Faxon and John W. Bartholomew of Lawton, O. T.

Orlando, O. T.—Creamery.—Orlando Creamery Co. has been incorporated with \$5000 capital stock by M. D. Sittell, Fred Mugler, D. D. Smith, B. J. Tucker and S. B. Miller.

Shawnee, O. T.—Bottling Works.—Incorporated: Anchor Steam Bottling Works, with \$10,000 capital stock, by W. H. McNary, W. S. Cade and E. C. Stanard.

BURNED.

Angier, N. C.—Williams Milling Co.'s cotton gin; loss \$3000.

Charles Town, W. Va.—William Phillips' Sons' lumber plant and planing mill; loss \$60,000.

Crandall, Tenn.—C. N. Pile's sawmill; loss \$2000.

Freeman, Va.—J. T. Newell's sawmill; loss \$10,000.

Gainesville, Texas.—Bomar & Nelson's cotton gin; loss \$6000.

Huttig, Ark.—Union Saw Co.'s foundry; loss \$400.

Millville, Fla.—German-American Lumber Co.'s sawmill; loss \$100,000.

Norfolk, Va.—Southern Cider Co.'s plant.

Rison, Ark.—David Roberts' cotton gin.

Sulphur Springs, Texas.—Farmers and Ginners' Cotton Oil Co.'s plant; loss \$15,000.

Wilmington, N. C.—Cape Fear Fisheries Co.'s dry-kiln; loss \$3000. O. J. Delaney, Philadelphia, Pa., is general manager.

Wylie, Texas.—Wylie Rustler Publishing Co.'s plant; loss \$2800.

BUILDING NOTES.

* Means machinery, proposals or supplies are wanted, particulars of which will be found under head of "Machinery, Proposals and Supplies Wanted."

Alexandria, La.—City Hall.—City will vote in January on the issuance of \$30,000 of bonds for the erection of City Hall. Address Mayor Turner.

Alexandria, La.—Church.—Methodist congregation is arranging for the erection of edifice. Address The Pastor.

Alexandria, La.—Office Building.—Abe Simons and Dr. Pierson have purchased site on which to erect five-story brick and stone office building.

Andalusia, Ala.—School Building.—City has voted affirmatively the issuance of \$20,000 school-building bonds. Address The Mayor.

Anniston, Ala.—Business Building.—Bids will be received until January 5 at the office of Charles W. Carlton, architect, 11-13 Cald-

well Building, Anniston, Ala., for the materials and labor for erecting a three-story 55x100-foot brick and terra-cotta business building for John B. Knox. Money order or certified check for \$10 must accompany bid; usual rights reserved.

Anniston, Ala.—Store and Office Building.—John B. Knox has had plans prepared by Charles W. Carlton for a three-story store and office building.

Ardmore, I. T.—Cotton-storage House.—Ardmore Oil & Milling Co. will erect a frame building, 40x50 feet, replacing cotton-storage house recently burned.

Baltimore, Md.—Dwellings.—Joseph Schamberger, builder, 2122 East Baltimore street, will erect 16 two-story brick dwellings on South Curley street to cost about \$15,000.

Baltimore, Md.—Nurses' Home.—The Union Protestant Infirmary, Dr. Wm. M. Dabney, superintendent, 1514-1528 Division street, will, it is reported, erect addition to nurses' home.

Baltimore, Md.—Store Building.—Thomas O'Neill, Charles and Lexington streets, has commissioned Baldwin & Pennington, architects, Professional Building, 330 North Charles street, to prepare plans and specifications for four-story store building to be erected at 34 West Lexington street.

Baltimore, Md.—Warehouse.—The Terminal Warehouse Co., Pleasant and Davis streets, will erect four-story addition to its warehouse at Exeter, Front and Constitution streets; four stories, 140x140 feet; exterior walls of corrugated iron; steel-frame construction; Owens & Sisco, architects, Continental Building, Baltimore and Calvert streets.

Baltimore, Md.—Church.—St. Dominick's Roman Catholic Church, John R. Manly, rector, has awarded contract to R. N. McCulloch, 118 East Lexington street, for the construction of church building at Hamilton, a suburb of Baltimore; one story, 50x100 feet; brick with stone trimmings; electric wiring and fixtures; sanitary plumbing; heating system; cost about \$15,000; T. George Carroll, architect, Continental Building, Baltimore and Calvert streets.

Barloursville, Ky.—Building.—Contract will be let at once for the erection of a four-story fireproof brick building to cost \$60,000; steam heat and electric fixtures will be installed. Address C. C. Stoll, treasurer, Louisville, Ky.

Baton Rouge, La.—Capitol Building.—Bids addressed to Gov. N. C. Blanchard will be received until January 9 at the office of Favrot & Livaudais, Ltd., architects, New Orleans, La., for the restoration of Senate chamber and improvements to Capitol building, in accordance with plans and specifications by Favrot & Livaudais, Ltd., New Orleans, La. Certified check for \$750, payable to the State Treasurer, must accompany each bid. Contract for wiring let separately.

Benton, Ark.—Hotel.—J. W. Westbrook is organizing company to erect a \$10,000 hotel.

Bluefield, W. Va.—Store Building.—Bluefield Dry Goods & Notion Co., recently organized, will erect a four-story brick building, 50x135 feet, containing a floor space of 27,000 feet.

Brownsville, Texas.—Hotel.—B. F. Yoakum and associates are arranging to erect a \$100,000 hotel; to be four stories with a frontage of 250 feet.

Cabot, Ark.—Cotton Warehouse.—Chartered: Farmers' Union Cotton Warehouse Co., with \$5000 capital stock, by M. C. Beasley, M. C. Bizzell, W. E. Beasley, A. H. Chandler, H. L. Bearden and others.

Charleston, W. Va.—Store and Flat Building.—George Henneman is preparing plans for an eight-story store and flat building to be erected by Thomas Popp on site 77x172 feet.

Charlotte, N. C.—Dwelling.—Hunter & Vaughn are preparing plans for residence, reported December 20, to be erected by S. Wittowsky; two stories; ordinary construction; electric fixtures; cost \$1500.

Charlotte, N. C.—Parish-house.—St. Peter's Episcopal Congregation is reported to build parish-house. Harris Mallinckrodt is pastor.

Chattanooga, Tenn.—Lodge Building.—Chartered: Knights of Columbus Association of Chattanooga by John Stagmaier, John J. Mahoney, P. D. Cotter, Thomas P. McMahon and J. E. Donovan, to arrange for improvements to be made to building recently purchased; cost \$10,000.

Chattanooga, Tenn.—Office Building.—John Thompson is reported to erect an eight-story office building.

Chattanooga, Tenn.—School Building.—County Court will petition the Legislature in January for authority to issue \$75,000 county high-school bonds. Address County Clerk.

Clarksburg, W. Va.—Lodge Building.—Local lodge B. P. O. E. has purchased site on which to erect proposed \$40,000 building.

Cleburne, Texas.—Cotton Warehouse.—Farmers' Union Warehouse Co. is arranging for the erection of warehouse.

College Station, Texas.—Buildings.—Texas Mechanical and Agricultural College will petition the Legislature for an appropriation of \$50,000 for a boys' dormitory, \$75,000 for an engineering building, \$40,000 for steam-heating plant and \$4000 for farm equipment. H. H. Harrington is president.

Collins, Ga.—School Building.—City has voted affirmatively the issuance of \$7500 of bonds for the erection of school building. Address The Mayor.

Dallas, Texas.—School Building.—C. W. Bulger is preparing plans and specifications for building to be erected by Buckner Orphans' Home, R. C. Buckner, president and general manager; structure to be 85x165 feet, practically fireproof, and cost \$25,000. No bids will be asked; construction work will be done by day labor.

Dallas, Texas.—Business Building.—Herbert D. Ardrey has purchased site 50x100 feet on which to erect brick building.

Dallas, Texas.—Church.—W. J. Nichols has contract to erect edifice for the Tabernacle Methodist Church, referred to October 4. J. E. Flanders prepared the plans.

Eagle Lake, Texas.—Store Building.—R. B. Dobbin and associates are organizing company with \$40,000 capital stock and have purchased and will enlarge store building.

Flint, Mich.—Masonic Temple.—A Masonic temple to cost from \$50,000 to \$60,000 is to be erected. Judge C. H. Wisner, care of Circuit Court Chambers, is chairman of building committee; F. D. Clarke, superintendent Michigan School for Deaf, secretary; size of lot 132x148; building not to cover entire ground, but to set back, with grass plat surrounding. Competitive sketches from architects will be received; building to have commandery drillroom, lodgerooms, banquet hall, kitchen, clubrooms and parlors; to be erected of finest pressed brick obtainable.

Fordyce, Ark.—School Building.—I. A. Black has contract for the erection of school building, mentioned November 29. The structure will be of brick and stone and cost \$16,000.

Fort Worth, Texas.—Business Building.—E. E. Bewley will erect a three-story building 25x35 feet.

Fort Worth, Texas.—Business Building.—George Reynolds is having plans prepared for a three-story business building, 25x35 feet, to cost \$25,000.

Gassaway, W. Va.—Church.—Harding & Upman, Washington, D. C., are preparing plans for a stone church to be erected by H. G. Davis, Elkins, W. Va., at a cost of \$25,000 for Presbyterian congregation. (Referred to December 20.)

Gibson, Ga.—Courthouse and Jail Building.—Glascok county has voted affirmatively the issuance of \$15,000 courthouse and \$2000 jail bonds. Address County Clerk.

Hagerstown, Md.—School Building.—George B. McC. Wolf has contract to erect \$40,000 school building, for which H. E. Yessler, York, Pa., was previously reported as preparing plans.

Hazlehurst, Miss.—Parsonage.—Baptist congregation has contracted with W. H. Lowe for the erection of proposed \$6000 parsonage.

Hermitage, Ark.—Store Building.—Hermitage Hardware Co., recently incorporated, will erect a one-story brick building, 40x100 feet.

Kansas City, Mo.—Hotel.—J. A. Rose has secured permit for the erection of three-story hotel, 44x101 feet; cost \$35,000.

Kansas City, Mo.—Hotel.—Arrangements are being made for the erection of 12-story addition and three additional stories to present nine-story structure of the Hotel Baltimore; cost \$600,000; owned by Bernard Corrigan, president Metropolitan Street Railway, and estate of Thomas Corrigan.

Kansas City, Mo.—Warehouse.—Townley Metal & Hardware Co. is completing arrangements for the erection of proposed warehouse; five stories, 60x140 feet; cost \$40,000.

Kansas City, Mo.—Business Building.—A. B. Anderson, New York Life Building, is preparing plans for building reported December 13 to be erected by J. C. Gates, 117 East 9th street; five stories, 96x115 feet; mill construction; cost \$75,000.

Lake City, S. C.—Bank Building.—Charles McMillan, Wilmington, N. C., has been commissioned to prepare plans and specifications for building to be erected by the Farmers and Merchants' Bank.

Lonoke, Ark.—Bank Building.—C. L. Thompson, Little Rock, Ark., is preparing plans for building to be erected by the Lonoke County Bank, recently organized.

Louisville, Ky.—Library Building.—Bids marked "Proposals for the Crescent Hill Branch Library" and addressed to Building Committee, Louisville Free Public Library, 533-519 Fourth avenue, Louisville, Ky., will be received until January 8. Proposals must cover all labor and material required for excavations, brickwork, cut stone, ironwork, concrete, tiling, plaster work, marble work, carpenter work, roofing and sheet-metal work, plumbing, heating, electric wiring and other work shown and specified. Plans and specifications may be examined at Building Contractors' Exchange, Tyler Building, and at the office of Thomas & Bohne, architects, 511 Keller Building. Certified check on a Louisville bank for 5 per cent. of bid must accompany each proposal; usual rights reserved.

Lubbock, Texas.—Business Building.—J. S. Greene will erect a two-story business building.

Marshall, Texas.—City Hall.—Plans by Lange, Wichell & Lancaster have been adopted for city hall reported November 22 to be erected at a cost of \$40,000.

Memphis, Tenn.—Hospital.—Arrangements are being made for the erection of a Methodist hospital to be known as the Tri-State Hospital, to be 286x150 feet and cost \$50,000. A two-story building to cost \$34,000 will be erected in the rear. Dr. J. L. Jelks, Dr. J. H. E. Rosamond and Dr. J. A. Lipscomb are mentioned as organizers.

Memphis, Tenn.—Apartment-house.—Caruthers Ewing, R. Brinkley Snowden and Russell Martin are having plans prepared for a three-story stone apartment-house to cost \$125,000. It is proposed to organize company to operate same.

Montgomery, Ala.—Bank and Office Building.—The building to be erected by the First National Bank, previously referred to, for which plans have been prepared by Carpenter, Blair & Gould, 475 Fifth avenue, New York, will be 12 or 14 stories, 80x90 feet; fireproof; steel frame; first three stories stone, balance of brick; terra-cotta cornice; vacuum heating system; electric fixtures; electric elevator, 300 feet per minute; cost \$400,000. Contract will be awarded December 27.

Muskogee, I. T.—Hotel.—It is reported that a modern fireproof hotel will be erected, and the Indianola Contracting Co. is promoting same.

Newport News, Va.—School Building.—School Board is considering the erection of brick annex to School No. 4, to accommodate 300 to 300 pupils and cost between \$7000 and \$10,000.

Nixon, Texas.—Bank Building.—J. W. Deubner has contract to erect building for the Nixon State Bank, mentioned last week; J. Flood Walker, San Antonio, Texas, architect; building to be of brick veneer, 25x45 feet.

Norfolk, Va.—Amusement Building.—Merri-mac and Monitor Corporation, reported chartered December 20, will erect a wood building, 132x157x60 feet, for amusement purposes; Harry Weatherwax, architect. E. W. McConnell is general manager.

Norfolk, Va.—Warehouse.—Chartered: Virginia Fireproof Warehouse Corporation with \$200,000 capital stock to erect a four-story concrete-and-brick bonded warehouse, for which plans have been prepared by Breese & Mitchell. John L. Farant is president; W. T. Ham, vice-president; Julian Osborne, secretary treasurer.

Oklahoma City, O. T.—Building.—Board of the Baptist Orphans' Home will receive bids until January 7 for a building, the foundation of which has been placed. Plans and specifications at office of Turbyfill & Mohr. Bids must be filed with Robert Chowning, 15 North Robinson street, Oklahoma City; usual rights reserved. L. H. Holt is secretary.

Oklahoma City, O. T.—Medical College.—College of Medicine of Epworth University will erect a \$30,000 college building, and a stock company will be organized by the faculty of the college, Dr. A. K. West, dean, for this purpose.

Paducah, Ky.—Bank and Office Building.—Plans are being completed for 10-story steel structure to be erected by the First National Bank; to have a spiral stairway, double elevators and 12 office-rooms on each floor; cost \$100,000.

Porter Springs, Ga.—Hotel, etc.—Porter Springs Land Co. has been incorporated with \$12,000 capital stock by Henry P. Farrow, John A. Whitner, Lidle F. Whitner, John Cooper and Janie F. Cooper to operate hotel, etc.

Princess Anne, Va.—Office Building.—Bids will be received until December 31 at the office of Ferguson & Calrow, architects, 633 Law Building, Norfolk, Va., for remodeling office of County Clerk. Certified check for \$500 must accompany each bid; usual rights reserved. Plans and specifications may be obtained at the office of the architects on deposit of \$15 after December 24.

San Antonio, Texas.—Masonic Temple.—Contract has been let for the erection of proposed Masonic temple to cost \$23,000. Address Nat M. Washer or T. P. Walsh. (Referred to October 11.)

Seguin, Texas.—Depot.—Reported that the Southern Pacific Railroad will erect a \$12,000 passenger and freight depot. A. McDonald, Houston, Texas, is superintendent of bridges and buildings.

Sewell's Point, Va.—Exposition Building.—Thomas E. Young, Chicago, Ill., has contract for the erection of the Louisiana building on the Jamestown Exposition grounds; cost \$19,000 to \$13,000. The building will be two stories, of frame, with slate roof.

Sewell's Point, Va.—Exposition Building.—J. D. Elliott of Hickory, N. C., is lowest bidder and has been awarded contract for the erection of North Carolina building at the Jamestown Exposition, to be 50x50 feet and cost \$20,000. Electric fixtures will be installed.

Sewell's Point, Va.—Exposition Building.—An appropriation of \$10,000 will probably be made for the erection of building on the exposition grounds by the State of Tennessee. John I. Cox, Nashville, Tenn., is Governor.

Sewell's Point, Va.—Exposition Building.—Contract will be let about January 1 for the construction of building on the Jamestown Exposition grounds for New York State, referred to November 22. It is proposed to reproduce "Arlington," the home of Gen. Robert E. Lee. T. B. Dunn of Rochester, N. Y., is president of the New York Commission.

Sewell's Point, Va.—Exhibit Building.—J. A. Fay & Egan Co., Cincinnati, Ohio, will erect building on the Jamestown Exposition grounds (mentioned December 20), in which to exhibit woodworking machinery it manufactures. Electric motors will be installed.

Sewell's Point, Va.—Exposition Building.—The erection of building on the exposition grounds is being considered by the State of Vermont. Address Governor Proctor, Montpelier, Vt.

Shreveport, La.—Bank and Office Building.—Continental Bank & Trust Co. will let contract January 14, 1907, for erection of six-story bank and office building, in accordance with plans and specifications on file at bank and with Perry, Bridges & Snyder, architects. Building to be completed by July 1, 1907, and banking-room and accessories to be completed by May 1, 1907, ready for decorators and fixture contractors. Certified check for \$2000 must accompany each bid. Usual rights reserved. L. W. Thomas is chairman of building committee.

Shreveport, La.—Car Shed, etc.—Shreveport Traction Co. has contracted for the erection of car shed and paving about a mile of streets. About \$35,000 will be expended.

Spencer, Tenn.—Courthouse.—Van Buren county will erect a two-story brick building, 60x45 feet, replacing courthouse reported November 29 as destroyed by storm. W. R. Paine is chairman of County Court.

St. Louis, Mo.—Flat Building.—Frank Stein will erect a two-story brick flat building to cost \$7500.

St. Louis, Mo.—Masonic Temple.—W. F. Smith, 6318 Virginia avenue, has contract to erect building for South End Masonic Temple Association, for which plans were reported November 1 as being prepared by W. A. Cann, 1024 Missouri Trust Building; three stories, 50x90 feet; brick; steam heat; electric and gas fixtures; cost \$25,000.

St. Louis, Mo.—Warehouse.—Seventeenth Street Realty Co. has secured permit for the erection of proposed \$25,000 warehouse to be occupied by J. L. Boland Book & Stationery Co.

St. Louis, Mo.—Library Building.—Moritz Eysell has contract to build the Carondelet branch of the St. Louis Public Library; one story, 150x150 feet, and cost \$75,000.

St. Louis, Mo.—Office Building.—Construction work will begin at once on 18-story office building to be erected by the Monetary Realty Co. at a cost of \$750,000; Eames & Young, architects.

St. Louis, Mo.—Building.—Board of Public Improvements is considering plans and specifications for a swimming pool; building to cost between \$10,000 and \$12,000.

St. Louis, Mo.—Building.—Frank Sievers has contract to erect building for the Alice Investment Co. after plans by W. J. Burgdorf; 25x40 feet; mill construction; steam heat; gas and electric fixtures; cost \$7500.

St. Louis, Mo.—Hotel.—Chartered: Vandeventer Hotel Co., with \$10,000 capital stock, by Charles L. Strough, Francis S. Higgins and William A. Horr.

Tylerstown, Miss.—Building.—W. W. Easley of Magnolia, Miss., has contract to erect brick store building 30x90 feet for Conerly & Willis.

Vernon, Texas.—Warehouse.—Chartered: Wilbarger County Union Warehouse Co. has been incorporated with \$10,000 capital stock by W. M. Bowman, C. L. Knapp, Joseph Schmidt and W. H. L. Campbell.

Washington, D. C.—Dwelling.—Referring to dwelling to be erected on New Hampshire avenue N. W. for George F. Huff, 1325 16th street N. W., Norcross Bros. Company, Colorado Building, are among those estimating on construction; four stories, 60x65 feet; brick with stone trimmings; structural iron and steel; electric wiring and fixtures; sanitary plumbing; heating system; Horace Trumbauer, architect, Land Title Building, Philadelphia, Pa.; bids to be in January 2.

Washington, D. C.—Hospital.—Frank Miles Day, architect, Philadelphia, Pa., has completed plans and specifications for \$100,000 municipal hospital to be erected on Brightwood avenue. Bids on construction will shortly be taken by District Commissioners.

Weldon, N. C.—Cotton Warehouse.—Weldon Cotton Manufacturing Co. has let contract to T. W. Russell for the erection of cotton warehouse with a storage capacity of 500 bales; 40x50 feet; mutual standard; frame with brick foundation.

Washington, D. C.—Office Building.—The F. H. Smith Company, 1408 New York avenue N. W., representing clients, has obtained options on lot at southeast corner 15th and H streets N. W., and if purchased office building will be erected on site, which is 131x154 feet.

Washington, D. C.—School.—The Reform School, Isaac D. Porter, superintendent, Bladensburg road N. E., has awarded contract to Richardson & Burgess, Colorado Building, for the construction of two school buildings at their bid of \$92,277. Administration building to be 2½ stories, 42x142 feet; brick with stone trimmings; structural iron and steel; sanitary plumbing; electric wiring and fixtures; heating system; reinforced concrete work; slate roof.

Weldon, N. C.—Hotel.—T. H. House and A. C. House are arranging for the erection of hotel.

Winchester, Va.—Library Building.—Mankin Construction Co., Richmond, Va., has contract at \$110,000 for the erection of proposed Handley library.

RAILROAD CONSTRUCTION.

Railways.

Abbeville, Ga.—The full list of incorporations of the Abbeville & Northwestern Railway Co., which has been chartered to build from Abbeville via Pineview and Unadilla to Fort Valley, Ga., about 50 miles, is as follows: J. L. Bankston, J. R. Monroe, Hal Lawson, W. L. Harrell, L. P. Wimberly, W. H. Wilkinson, G. F. McLeod, W. B. Fussell, T. R. Moye and W. A. Cherry, all of Abbeville.

Ardmore, I. T.—E. E. Colby is making a survey from Ardmore to Henrietta for the proposed Chickasha & Southeastern Railroad, which line will run to Denison, Texas.

Asheville, N. C.—The Asheville Rapid Transit Co. has been chartered to acquire and operate the Asheville Loop Line Railway, branches and extensions; authorized capital \$500,000. The incorporators are Chas. E. Van Bibber, Maiden, Mass.; Thomas S. Rollins and John P. Arthur, both of Asheville, N. C. The company has the right to build anywhere within 25 miles of Asheville, and it is said that a line to Weaverville will be constructed. Mr. Van Bibber is president of the Railways Construction & Securities Co. of New York. The line to Overlook is first to be built.

Baltimore, Md.—The Canton Company of Baltimore will, it is announced, resume work on the Canton Belt Line, right of way being assured. Four miles have been constructed.

Beaumont, Texas.—The Texas & New Orleans Railroad (Southern Pacific System) proposes to build several additional yard tracks at Beaumont and also to extend double track there. A. V. Kellogg is engineer maintenance of way, Houston, Texas.

Cairo, W. Va.—Reported that the narrow-gauge railroad 16 miles long from Cairo, W. Va., to McFarland, which was built by How-

ard Hazlett, L. E. Sands and others of Wheeling, will be extended 20 miles from McFarland to Glenville, W. Va.

Charleston, W. Va.—The Kanawha & Michigan Railway will, it is reported, reduce grades and curves at various points on its entire line, it being proposed to lower grades east of the Ohio river to three-tenths of 1 per cent. C. Buxton is chief engineer at Toledo, Ohio.

Charlotte, N. C.—The Southern Power Co. has let a contract to Stewart & Jones to build five miles of railroad from King's Creek to the power site at Ninety-Nine Islands on Broad river.

Chattanooga, Tenn.—The Sequatchie Iron, Coal & Land Co. of Spring City, Tenn., will, it is reported, build a railroad from that point to coalfields on Walden's Ridge. L. G. Young and T. C. Duncan of Union, S. C., are said to be interested.

Denison, Texas.—Preliminary survey is in progress for the Missouri River & Gulf Railway from Denison, Texas, as far as the Blue river in Indian Territory. Line will be continued to Kansas City. The chief engineer is E. Holbrook at 902 New Nelson Building, Kansas City, Mo.

El Reno, O. T.—The Canadian Valley Railroad Co., which is building a line from Woodward, O. T., to Katon, N. M., has filed a mortgage to secure \$5,500,000 of bonds. R. A. Ensign of New York is promoting the line.

Falmouth, Va.—A. M. Yonge, chief engineer of the Falmouth Railway at Richmond, Va., is reported as saying that surveys are made and right of way practically all secured for this line from granite quarries on the Rappahannock river to a connection with the Richmond, Fredericksburg & Potomac Railroad, four miles.

Fayetteville, Ark.—J. W. Baxter informs the Manufacturers' Record that the Boston-Ozark Traction Co. has not yet incorporated, as plans are not fully complete.

Fayetteville, N. C.—Survey has been completed for the proposed Bladen & Northern Railroad from Stedman, nine miles east of Fayetteville, to Elizabethtown, 30 miles. William Moncre of Raleigh is chief engineer.

Fredericksburg, Texas.—Concerning the report that a line would be built to Fredericksburg, an officer of the San Antonio & Aransas Pass Railway informs the Manufacturers' Record that the company does not contemplate making any extensions in the very near future.

Grayson, Ky.—J. C. Horner is reported to be obtaining rights of way for the Kentucky North & South Railroad, lately incorporated to build from Portsmouth, Ohio, through Greenup, Carter, Elliott, Magoffin, Knott and Pike counties, Ky., to coal fields. It is said the line will go via Tygart's Creek, Warnock, the north fork of Everman's creek, and Grayson.

Greenville, S. C.—The Saluda Valley Railway (or Greenville & Knoxville) has laid track from Greenville to Montague, six miles, and it is to be continued to Marietta, S. C., and Zaconia, N. C. W. T. Patterson of Atlanta, Ga., is president.

Henryetta, I. T.—The Oklahoma City, Henryetta & St. Louis Railroad Co. has, it is reported, closed a contract with citizens of Henryetta to build a line from here to Oklahoma City.

High Point, N. C.—L. V. Edwards, chief engineer of the Carolina, Glen Anna & Pee Dee Railroad, is quoted as saying that surveys have been made for 50 miles and right of way obtained for 25 miles. There will be 21 miles of new construction and 90 miles of new heavy work. Capital is said to have been secured. Dee Allen is president at High Point, N. C., which is also the address of the chief engineer.

Hyattsville, Md.—Wells & Wells, counsel at Hyattsville and also at the Commercial National Bank Building, Washington, D. C., are reported as saying that survey is in progress for the proposed Washington, Patuxent River & Drum Point Railroad from Pindell on the Chesapeake Beach Railway to Drum Point, Md., 35 miles, via Prince Frederick, Dunkirk and Solomon's Island. Construction contracts are to be let in the spring.

Kansas City, Mo.—The Kansas City-Olathe Electric Railway, which has been constructed for five miles, has been purchased by J. A. Stewart of Kansas City, a contractor, who may complete it.

Longview, Texas.—The Gulf, Colorado & Santa Fe Railway proposes to build extensions of the Texas & Gulf from Center to Timpon, Texas, 15 miles, and from Longview to the Red river, 125 miles, which latter is to finally extend 150 miles farther to connect with the Kansas City line of the

Atchison, Topeka & Santa Fe Railway. C. F. W. Felt is chief engineer at Galveston, Texas.

Macdonald, W. Va.—The Pincy River & Paint Creek Railroad has filed map of its proposed line extension from Bickel to a connection with the Deepwater Railway near Harper, W. Va. The New River Fuel Co. is interested.

Macón, Ga.—The Chambers Contracting Co. informs the Manufacturers' Record that it is building a railroad about seven miles to be used in the fulfillment of a logging contract on the Oconee river. The line is almost completed and it is expected will be in operation about January 15. J. H. Chambers is president; J. M. Chambers, vice president, and J. S. Chambers, secretary and treasurer.

Meridian, Miss.—The proposed Meridian & Philadelphia Railroad will, it is said, be financed by G. Stephenson, a Canadian capitalist. The Board of Trade may be able to give information.

Moss Point, Miss.—O. H. Brown is chief engineer for the extension of W. Denny & Co.'s lumber line, 18 miles, to Donavan, Miss., but the work is to be done by the company, of which A. S. Denny is president.

Nashville, Tenn.—Reported that plans have been made to finance the proposed Nashville & Lewisburg Interurban Railway through an English syndicate. Surveys have been made and right of way obtained for some time. The incorporators are Edgar Jones, R. J. Lyle, E. R. Richardson, Dr. J. R. Sheppard and W. L. Horn.

Natchez, Miss.—With reference to the report that the Illinois Central proposed to build a line from Natchez to Woodville, Miss., an officer of the company informs the Manufacturers' Record that as far as he knows there is no construction contemplated between those points.

Natural Bridge, Ky.—Reported that M. H. Courtney of Winchester, Ky., has purchased an interest in the Mountain Central Railroad from John O. Ray, and that the line, which runs from Natural Bridge to Campton, Ky., 14 miles, will be converted from narrow to standard gauge.

Pangburn, Ark.—The Missouri & North Arkansas Railroad has been authorized to build its proposed extension from Pangburn to Helena, Ark., 38 miles, via Searcy, Higginson and near Brinkley. W. S. Dawley, chief engineer of the Allegheny Improvement Co., Security Building, St. Louis, Mo., can probably give information.

Pemberton, W. Va.—Reported that the Raleigh & Southwestern Railway Co., owned by the Raleigh Lumber Co., will build five miles of line along Soak creek to Winding Gulf creek. Bids have been requested.

Sargeant, Ky.—Reported that Samuel Aston and others of Cleveland, Va., will build a railroad, starting work immediately, to develop coal and timber lands in the center of Knott county, Kentucky.

Shawnee, Okla.—Alfred Hare is reported as saying that he will construct another electric railway, this time from Shawnee to Muskogee and from Shawnee to Norman. Preliminary work is nearly completed.

Spartanburg, S. C.—The Charleston & Western Carolina Railroad has, it is reported, purchased 30 acres of land which will be used for yards and terminals. E. B. Pleasants, chief engineer of the Atlantic Coast Line at Wilmington, N. C., can probably give information.

Teague, Texas.—An officer of the Trinity & Brazos Valley Railway writes the Manufacturers' Record that he knows nothing about any plan to build a line from Teague to Paris, Texas. This denies a recent press report.

Tuscumbia, Ala.—F. T. Petty of Huntsville, Ala., who is interested in the proposed Huntsville & Birmingham Electric Railway, is also reported to be endeavoring to organize another company at Tuscumbia to build a line in connection with the other and reaching Gadsden, Tuscumbia, Sheffield and Florence, Ala.

Union, W. Va.—The Bluestone Land & Lumber Co. is reported to be surveying for a standard gauge railway from a connection with the Deepwater Railway at Low Gap, two miles northeast of Princeton, W. Va., along Brush creek and Bluestone river, via Spanishburg and Camp Creek, to coal and timber lands.

Victoria, Texas.—L. A. Guerlinger, chief engineer of the Port O'Connor, Rio Grande & Northern Railroad (formerly the Texas Railway), is reported as saying that grading is under way from Yoakum to Gonzales, Texas, 26 miles, and that line is being located from Granger to San Antonio, Texas. The grade from Yoakum to Port O'Connor, 30 miles, is an old one, and the entire line

from Port O'Connor to San Antonio will be 190 miles.

Victoria, Texas.—The Texas Railway Co. has amended its charter, changing its name to the Port O'Connor, Rio Grande & Northern Railway Co. Its proposed line is from Port O'Connor, on the Gulf, to Victoria, Yoakum, Gonzales and Seguin, and thence to San Antonio, Texas, 200 miles, with branches as follows: Gonzales to Smithville, 50 miles; Yoakum to Lagrange, 61 miles; from a point 21 miles south of Yoakum to Cuero, 20 miles, and Seguin to New Braunfels, 17 miles. Michael Goggin is president, W. I. Allen is vice-president and general manager. L. A. Guerlinger is chief engineer, and John Sullivan is superintendent of construction.

Vicksburg, Miss.—An officer of the Vicksburg Railway & Light Co. writes the Manufacturers' Record that there is no truth in the press report that an extension may be built from Vicksburg to Yazoo City and Greenville, Miss.

Welch, W. Va.—Reported that the Norfolk & Western Railway will shortly let contracts for building single-track and second track near Welch. C. S. Churchill is chief engineer at Roanoke, Va.

Wheeling, W. Va.—Plans are reported to be under way to build an electric railway connecting Wheeling and Parkersburg, W. Va., the line to run through the Ohio valley, connecting several towns in Ohio. John Schrader of Chester, W. Va.; Albert H. Boone of Zanesville, Ohio, and John Bane are mentioned as being interested.

Street Railways.

Ardmore, I. T.—It is announced that the Ardmore Light & Power Co. will begin construction immediately on its proposed street railway.

Elkins, W. Va.—The Leadville Power Co., R. Chaffey, incorporator, gives notice that on January 17 it will apply for a street-railway franchise in Elkins.

Greensboro, N. C.—Reported that a contract has been let to W. D. McAdoo, Jr., to build an extension of the West Lee Street Railway.

Macon, Ga.—The Macon Railway & Light Co. proposes to extend the South Macon car line.

Montgomery, Ala.—The Montgomery Traction Co. is reported, is considering building a line from Montgomery to Alexander City, and a survey is said to be in progress.

Norfolk, Va.—The Norfolk & Portsmouth Traction Co. will, it is announced, spend \$100,000 for improvements to prepare for the Jamestown Exposition. E. C. Hathaway is general manager.

Wilson, N. C.—George D. Green of Wilson is said to represent out-of-town capital in the recent application for a street-railway franchise.

MACHINERY, PROPOSALS AND SUPPLIES WANTED.

Manufacturers and others in need of machinery of any kind are requested to consult our advertising columns, and if they cannot find just what they wish, if they will send us particulars as to the kind of machinery needed we will make their wants known free of cost, and in this way secure the attention of machinery manufacturers throughout the country. The Manufacturers' Record has received during the week the following particulars as to machinery that is wanted.

Alcohol.—Bids will be received until January 8 at Bureau of Supplies and Accounts, Navy Department, Washington, D. C., for furnishing 800,000 pounds of alcohol at naval proving-ground, Indian Head, Md. Applications for proposals should refer to Schedule 344; blank proposals furnished on application. E. B. Rogers, Paymaster-General, U. S. N.

Bank Fixtures.—H. Richard Smith, Mantee, Miss., wants competitive bids on fixtures and stationery.

Blow Fan.—Southern Bobbin, Spool & Shuttle Co., H. B. Worth, treasurer, Greensboro, N. C., wants a 30-inch A B C blow fan or Sturtevant 30-inch fan for blowpipe system.

Binding Machinery.—Purse Printing Co., Chattanooga, Tenn., will probably want to purchase some binding machinery.

Boiler.—Santa Maria Irrigation Co., Santa Maria, Texas, will purchase additional boiler during the year. (See "Pump.")

Boiler.—See "Engine and Boiler."

Boilers.—See "Engines and Boilers."

Boilers.—See "Water-works Equipment."

Boxes.—Southern Poultry Supply Co., 910 E street N. W., Washington, D. C., wants addresses of manufacturers of wooden boxes for medicinal purposes.

Box Factory.—Everhart Lumber Co., Taylorsville, N. C., wants full information as to machinery required and cost of equipping small packing-box factory.

Bridge Construction.—Bids will be received until January 16 at office of Ennis M. Douglas, City Register, Memphis, Tenn., for furnishing material and erecting steel-girder bridge carrying Madison avenue over Southern Railway tracks; plans on file in office of City Engineer; all bids to be accompanied by detailed plans and specifications of bidders, giving size of all members, time of completion, etc. Erection of bridge must be accomplished without closing of tracks of Southern Railway and without closing more than one track of the Memphis Street Railway; bids to include widening or lengthening of present abutments with concrete. This work may be bid upon by the cubic yard, and so stated in the bid, or the bid on the bridge will be construed to include building pier additions; the old span after its removal by contractor to be the property of city. Certified check for \$250 must accompany each bid; usual rights reserved. James H. Malone is Mayor.

Bridge Construction.—Supervisors of Perry county, Mississippi, will let contract at public outcry in front of the courthouse door at New Augusta, Miss., January 8, 1907, for the construction of steel bridge across Big Black creek to the lowest bidder; plans and specifications on file in office of T. E. Batson, clerk, Hattiesburg, Miss.; usual rights reserved.

Building Materials.—T. B. Martin, Jr., Little Rock, Ark., wants prices on building materials.

Chemical Apparatus.—See "Drug-factory Equipment."

Collar-pad Machinery.—Earle M. Cary, Clarksville, Tenn., wants addresses of makers of machinery for stuffing collar pads.

Compressed-air Plant.—J. Lee Hale, Chattanooga, Tenn., wants new or second-hand compressed-air plant for rock-drilling purposes.

Concrete Mixers.—J. Lee Hale, Chattanooga, Tenn., wants to correspond with concrete-mixer manufacturers, agents, etc.

Construction Work.—Harvey Canal, Land & Improvement Co., H. P. Dart, president, Harvey, La., will receive bids until January 2, 1907, for construction of a pile bulkhead approach at and excavation of entrance to Harvey lock; bond required, \$500; deposit required, \$100. For bidder's blanks and further information call at office of company or at Room 402 Cotton Exchange Building; usual rights reserved.

Cotton-rope Machinery.—Geo. J. Stevens, Wesson, Miss., wants addresses of manufacturers of cotton-rope machinery.

Cutlery.—Heutelbach & Pesaro, Milan, Italy, wants to correspond with manufacturers of arms, knives, etc., relative to securing agency.

Dredges.—Bids will be received until January 12 at the office of D. W. Roos, general purchasing officer, Isthmian Canal Commission, Washington, D. C., for furnishing and delivery, free of all charges, at either Cristobal (Atlantic port) or La Boca (Pacific port), Isthmus of Panama, or port in the United States, two suction dredges. Blanks and general information relating to circular No. 345 may be obtained at the office of the general purchasing officer or the offices of the assistant purchasing agents, 24 State street, New York; Custom-house, New Orleans, La.; 1086 North Point street, San Francisco, Cal.; and 410 Chamber of Commerce Building, Tacoma, Wash.; also from chief quartermaster, Chicago; depot quartermaster, St. Louis; depot quartermaster, Jeffersonville, Ind.; chief quartermaster, Atlanta, Ga., and the Commercial Club, Mobile, Ala.

Drug-factory Equipment.—C. W. Elliott Company, Northfork, W. Va., wants addresses of manufacturers of apparatus for manufacturing druggists and chemists.

Dry-klin.—W. F. Luckie, care of Helena Lumber Co., Helena, Ga., wants prices on 5000 to 6000-capacity dry-klin for woods.

Electrical Equipment.—T. B. Martin, Jr., Little Rock, Ark., wants prices on electrical equipment.

Electric Wiring.—See Building Note under Baton Rouge, La.

Electric-light Plant.—Hall Bros., Engineers, Dadeville, Ala., want prices on second-

hand machinery to equip a small steam electric-light plant of about 50 to 60 kilowatt capacity; all machinery for immediate shipment. Give complete description of each machine.

Electric-light Plant.—W. P. Chandler, Farmville, La., wants prices on electric-light plant for a small town.

Elevator.—H. M. Johnson, Gadsden, Ala., wants a hand-power elevator.

Engine and Boiler.—Dreher Manufacturing Co., A. Dreher, Jr., president, Cullman, Ala., will purchase 150-horse-power engine and boiler.

Engines and Boilers.—Gold Coin Mining Co., Gold Hill, N. C., will purchase engines and boilers. (See "Mining Equipment.")

Engines and Boilers.—T. B. Martin, Jr., Little Rock, Ark., wants prices on engines and boilers.

Excelsior Machinery.—McDowell & Duren, Box 74, Crockett, Texas, wants addresses of manufacturers of excelsior machinery.

Flint.—B. M. Root Company, York, Pa., wants prices on No. 3 crushed garnet flint in lots of 300 pounds or over.

Furniture-factory Equipment.—A. W. Robbins, Rocky Mount, N. C., will purchase machinery for the manufacture of furniture.

Hair Pickers.—Earle M. Cary, Clarksville, Tenn., wants addresses of makers of burr pickers for hair.

Heating.—See "Plumbing, etc."

Hoisting Engine.—James F. White, Nicanor, N. C., wants a new or second-hand 20-horse-power hoisting engine with two drums and to be reversible; would prefer horizontal boiler.

Hoisting Equipment.—See "Mining Equipment."

Ice Machinery.—J. D. Burkhalter and J. R. Thomas, Dayton, Tenn., want catalogues of machinery and equipment for four-ton ice plant.

Laundry Equipment.—I. Gelders, Fitzgerald, Ga., wants estimates on complete equipment for laundry; capacity 15,000.

Lighting Apparatus.—See "Plumbing, etc."

Machinery and Supplies.—Hermitage Hardware Co., Hermitage, Ark., wants to secure agency for machinery and supplies.

Machinery and Supplies.—Stephens Hardware Co., Dothan, Ala., will purchase mill supplies and machinery.

Metal-working Machinery.—Heutelbach & Pesaro, Milan, Italy, want to correspond with manufacturers of metal-working machines, wood material for railways, steel technical instruments, etc., with a view to securing agency.

Mining Equipment.—Gold Coin Mining Co., Gold Hill, N. C., will purchase engines, boilers, hoist, pumps, etc.

Mining Equipment.—J. M. Ivie & Sons, Kirksville, Mo., wants hoisting engines, mining cars and coal-mining supplies.

Naval Supplies.—Bids will be received until January 2 at Bureau of Supplies and Accounts, Navy Department, Washington, D. C., for furnishing at navy-yard, Norfolk, a quantity of naval supplies, as follows: Schedule 310, locks, hardware; Schedule 317, nuts, brass bolts, brass wire, turn-buckles, sheaves, hardware, Muntz metal, steel angles, miscellaneous metals, spiral packing, water-gauge glasses. Applications for proposals should designate schedules desired by number. Blank proposals will be furnished on application to navy pay office, Norfolk, Va., or to the bureau, E. B. Rogers, Paymaster-General, U. S. N.

Novelty Works.—J. J. McPherson, 222 23d street, Newport News, Va., wants to correspond with novelty manufacturers relative to having a picture rock (recently invented) manufactured.

Paper and Strawboard Machinery.—W. W. Dusen & Bro., Crowley, La., wants full information regarding machinery and equipment necessary for making strawboard, tissue paper, etc., from rice straw.

Paving.—L. G. Adams, City Clerk, El Reno, O. T., will receive bids until December 27 for grading and paving streets in accordance with plans and specifications on file in City Clerk's office. Each bidder must furnish a sample of material as shown by the specifications and a certified check equal to 5 per cent. of amount of bid, payable to the City Treasurer; all bids to be submitted on blanks furnished by city; usual rights reserved.

Picking Machinery.—See "Hair Pickers."

Piping.—See "Water-works Equipment."

Planing Mill.—W. F. Luckie, care of Helena Lumber Co., Helena, Ga., wants prices on planing mill.

Plumbing, etc.—Bids will be received until

January 15 by Lee Crouch, Clerk, Elkins, W. Va., for plumbing, heating, wiring and gas-piping of the new courthouse in accordance with plans and specifications on file in office of Clerk. Plans may be seen at office of J. Charles Fulton, Uniontown, Pa.

Press-cloth Manufacturers.—G. H. Bushnell Press Co., Thompsonville, Conn., wants addresses of manufacturers of camel's-hair press cloth.

Pump.—Santa Maria Irrigation Co., Santa Maria, Texas, will purchase pump during the year. (See "Boiler.")

Pumps.—See "Mining Equipment."

Pumps.—See "Water-works Equipment."

Railway Equipment.—See "Mining Equipment."

Railway Equipment.—See "Tank Cars."

Railway Equipment.—Wanted for prompt delivery a good second-hand six-wheel connected standard-gauge saddle-tank locomotive; also a good standard-gauge locomotive, complete with all fittings and in good condition, weight about 45 to 50 tons. Send full information and specifications by first mail. Address O. R. Whitney, 39-41 Cortlandt street, New York city.

Rope Tramways.—J. Lee Hale, Chattanooga, Tenn., wants rope tramways.

Roofing.—Sale-Davis Company, Anderson, Fla., wants 300 squares galvanized corrugated steel or iron roofing in either 28 or 32 gauge. Quote price f. o. b. Pensacola, Fla.

School Furniture.—See "Seating."

Seating.—C. D. McSwain, Emmet, Ark., wants seats for small schoolroom.

Sewerage System.—Board of Sewerage Commissioners, Thomas C. Doyle, chairman, Orangeburg, S. C., will receive bids until January 23 for construction of sewerage system. Plans and profiles may be seen at office of Edward Hawes, Jr., City Engineer, and specifications, contracts and other forms may be secured from L. H. Wannamaker, secretary of Board of Commissioners, or at the office of City Engineer on and after December 26. Certified check for \$1000 must accompany each bid, made payable to City Treasurer L. H. Wannamaker; usual rights reserved.

Sewerage System.—City of Cape Girardeau, Mo., Wm. H. Coerver, Mayor, will receive bids until February 4 for furnishing material and constructing a complete system of sewerage in sewer district No. 1. The work comprises about 12 miles of pipe sewers, 8 to 22 inches in diameter, together with all necessary appurtenances. Plans and specifications on file in office of George E. Chappell, City Clerk, and at office of Granbury Jackson, C. E., Nashville, Tenn. Printed specifications may be obtained by addressing the City Clerk. Certified check for \$1000 must accompany each bid; usual rights reserved.

Sewerage System.—Bids will be received until December 31 by C. M. Connor, secretary Commissioners Sewer District No. 48, at the Union Trust Co., Little Rock, Ark., for

construction of septic-tank sewer main and laterals for sewer district No. 48 according to specifications and profile on file in office of E. A. Kingsley, superintendent of public works, City Hall. Certified check for \$500 must accompany each bid; usual rights reserved.

Sewerage System.—Board of Public Affairs, W. C. Faucette, president, Argenta, Ark., will receive bids until January 10 at the City Clerk's office for the construction of sewer system according to plans and specifications on file in office of Commissioner of Public Works. A. B. Gerlach is secretary.

Sewing Machines.—See "Shirt Factory."

Sheet-steel Piling.—Dunnellon Phosphate Co. wants prices and descriptive matter on sheet-steel piling; will use 6000 square feet. Address E. E. Davis, chief engineer, Dunnellon, Fla.

Shirt Factory.—H. M. Clemmer, Dallas, N. C., wants information as to machinery and equipment for shirt factory.

Steam Trap.—Ashland Fire Brick Co., H. D. Savage, treasurer, Ashland, Ky., wants to purchase a steam trap to take care of a three-inch pipe line.

Steel.—See "Metal-working Machinery."

Steel Girders.—Box 213, Newnan, Ga., wants four steel girders 30 to 36 feet long and from 30 inches to 4 feet deep.

Stone-washing Machines.—City of Durham, N. C., wants to purchase an outfit for washing broken stone of one-half to one inch size, used in contact beds in a sewage-disposal plant; prefer one operated by gasoline engine. Gilbert C. White is City Engineer.

Tank.—D. W. Alderman & Sons Company, Alcolu, S. C., wants a second-hand iron or steel tank of any shape or form, open at top, to hold from 5000 to 8000 gallons of water.

Tank Cars.—Sherman Refining Co., J. C. Tassey, general manager, Sherman, Texas, wants new or second-hand tank cars of not less than 125-barrels capacity.

Water Wheels.—T. B. Martin, Jr., Little Rock, Ark., wants prices on water turbines and impulse wheels.

Water-works Equipment.—Bids will be received until January 9 by the City of Coalfield, I. T., for the purchase of cast-iron pipe and specials, boilers, pumps, hydrants and valves for water-works construction. Specifications may be had by addressing the O'Neil Engineering Co., Dallas, Texas.

Water-works.—City of Rolla, Mo., will receive bids until January 7 for the construction of water-works; cost \$48,000; McRae & Harris, Rolla, Mo., engineers in charge.

Well Drilling.—Camden Bottling Works, Camden, Ala., wants addresses of firms or individuals who engage in boring artesian wells.

Wiring.—See "Plumbing, etc."

Woodworking Machinery.—Jones Industrial Co., Marlon, S. C., wants a second-hand planer, tongue and groove.

INDUSTRIAL NEWS OF INTEREST

Wants Texas Bonds.

County, city and school bonds issued in Texas are wanted by J. B. Oldham, Dallas, Texas.

A Mineral Springs Investment.

A third interest in an unimproved summer mineral springs is offered for sale by W. F. Miller of Fort Valley, Ga.

Established Enterprise for Sale.

An established manufacturing enterprise at Louisville, Ky., said to be making a good profit is offered for sale by Harry Kahn, Montgomery, Ala.

Electric-Light and Water Works.

An established Southern electric-light plant and water-works, under 50-year franchise, are offered for sale. Address No. 55, care of the Manufacturers' Record.

Engineering Positions Available.

A stationary engineer familiar with the manufacture of ice and a superintendent for a sanitary milk plant are wanted. Apply 430 Vineville avenue, Macon, Ga.

Seeking Cotton-Mill Investments.

A certain capitalist is desirous of investing \$50,000 in the stock of cotton-mill enterprises in North Carolina, South Carolina and Georgia. Correspondence addressed to Post-office Box 35, Columbia, S. C., will have prompt attention.

An Industrial Site Offered.

An industrial site said to have unusual advantages is being offered for sale. It is lo-

cated in Houston, probably the most thriving city in the Southwest. The site comprises 55,000 square feet and is opposite the freight depot of the Harriman lines, trackage used by six railroads, and three blocks from the water front. To investigate address Messrs. Britton Bros., 602½ Main street, Houston, Texas.

Wants Position With Big Enterprise.

An office manager and credit man now connected with a half-million-dollar corporation wants to engage with another enterprise. He seeks a connection with large firm or corporation where absolute devotion to interests will be appreciated, and he is willing to invest. Has had six years' experience in banking, having held an official position. Address No. 57, care of the Manufacturers' Record.

Prompt Deliveries of Iron and Steel.

A prime consideration with buyers nowadays is time of delivery of purchased products. Manufacturers know this, and, other things being equal, the one who can supply goods most promptly will get the orders. This prompts the mention that Thatcher A. Parker of 202 North 1st street, Terre Haute, Ind., can furnish quick deliveries of structural iron and steel of all kinds. Mr. Parker has a large stock on hand.

Machinery and Supplies for Sale.

Purchasers of machinery and supplies will probably be interested in the announcement of H. E. Bumby, Bessemer, Ala. He has purchased a rolling mill and nail plant and offers for sale the muckbar and plate mill,

engines, shears, rotary squeeze, nail machines, 14 grindstones of 70 inches diameter, 11 flat cars and 200 tons of heavy charcoal cast scrap iron. Mr. Bumby also has other machinery and scrap iron to offer.

Virginia Farms for Sale.

Some of the best farming properties in Virginia are among those offered for sale by Messrs. H. W. Hilleary & Co. of Charlottesville, Va. This firm is at present endeavoring to dispose of one estate of 1000 acres, productive of grass and grain, with colonial-style buildings, near city; another is 1654 acres good grazing land near Washington; another is 1000 acres, with buildings, etc. Write Hilleary & Co. for particulars regarding their complete list.

A Handsome Souvenir.

The first trade souvenir of the season reaching the Manufacturers' Record will probably not be excelled by souvenirs received later. It is in the form of a small clock snugly held in a section of a log of wood, and suitable for either office use or a place on the mantel at home. The Florida Saw Mill Co. of Paxton, Fla., manufacturer of everything in yellow pine, sends the Manufacturers' Record this souvenir with the compliments of the season.

A Big Belting Contract.

One of the largest belting contracts awarded recently is that for the equipment of the Monquitt Spinning Mill at New Bedford, Mass. This mill is capitalized at \$1,200,000, will operate 60,000 spindles, and its engineers are Messrs. C. R. Makepeace & Co. of Providence, R. I. The belting will be furnished by the American Supply Co. of Providence, R. I. In obtaining the award the American Supply Co. is to be congratulated upon this recognition of its facilities for furnishing mill supplies.

Abrasive Materials to Every Country.

The products of the Abrasive Material Co. of Philadelphia are in demand not only in this country, but in foreign countries as well. Many foreign orders have been received recently, and abrasive wheels manufactured at the Philadelphia works are being shipped to all parts of the world. A recent order from Italy called for between 700 and 800 wheels of various sizes, the total weight being between four and five tons. In addition to this order there were others from England, Germany, Austria, Japan and Siberia.

Southern Timber Lands for Sale.

There are plenty of Southern timber lands available for purchase either to hold as investments or for prompt development. The properties on the market include several of which mention may be made. One is a 60-acre tract of pine, on deep water, three miles from Norfolk; another is said to contain 15,000,000 feet of timber, located near railroad; another is said to contain 8,000,000 feet of pine and 4,000,000 feet of gum, 10 miles from Norfolk and bounded by three railroads. For details address W. W. Robertson of Norfolk, Va.

Southern Hydraulic Engineering.

The Southern Hydraulic Engineering Co. has been organized to conduct a general hydraulic engineering business in the Southern States. It will sell certain lines of hydraulic machinery, as well as do hydraulic construction work. It will specialize on the Brooks centrifugal pumps. This new company has opened main office at 235 Equitable Building, Atlanta, Ga., and a branch office at 409 Woodward Building, Birmingham, Ala. With it are associated engineers of high standing, who will devote their efforts to designing and installation of hydraulic machinery.

News from Atlas Engine Works.

The Atlas Engine Works of Indianapolis has received an order from the American Shipbuilding Co. of Cleveland, Ohio, for two large tandem compound four-valve flash oiling engines of the latest type. The Atlas Company announces that James A. Muir, recently in charge of the Erie City Iron Works offices at Detroit, is now manager of the Atlas offices, Commercial Tribune Building, Cincinnati, Ohio, for the Cincinnati-Louisville district. An Atlas branch has been established at 58 Kenyon Building, Louisville, Ky., in charge of G. A. House, recently with the Erie City Iron Works at Detroit.

To Exhibit Hydraulic Cement Stone Machinery.

One of the most interesting displays of the annual exhibition of the National Association of Cement Users, which will be held in Chicago, Ill., on January 7 to 12, inclusive, is that of the Fisher Hydraulic Stone & Machinery Co., Baltimore, Md. The exhibit con-

sists of a complete working plant of this well-known concrete-block system, and cement users from all parts of the country will have an opportunity of inspecting at first hand the merits of manufacturing these blocks by hydraulic-power machinery. If you are interested in concrete blocks do not fail to see this exhibit.

New Offices at Buffalo.

The Power & Mining Machinery Co. of Cudahy, Milwaukee, Wis., in conjunction with the Snow Steam Pump Works of Buffalo, N. Y., has established new sales offices at 719 White Building, Buffalo. This office will offer the several types of gas-generating apparatus, such as the Loomis-Pettibone system suction and pressure gas plants built by the Power & Mining Machinery Co., and the Snow gas engines built by the Snow Steam Pump Works. Mr. Seward Babbitt, the sales manager of the Power Company, will make his headquarters at the Buffalo office on account of the facilities for conducting business from that point.

Investigate These Electric Lamps.

The steady increase of lighting plants throughout the South is causing a large demand for the Franklin mill type electric lamps manufactured by the Franklin Electric Manufacturing Co. of Hartford, Conn. Sales of this lamp are increasing daily, as reported by Mr. C. Leonard, manager of the Baltimore office and Southern representative. This type of lamp is now being adopted by central stations and millowners wherever "the most light and the best light for the least money" is needed. Users of incandescent lamps will find it to their advantage to investigate the merits of this new type lamps which the Franklin Electric Manufacturing Co. offers.

Roberts & Abbott in Chicago.

Reference was made in this column last week to the establishment of a Chicago office by the Roberts & Abbott Company of Cleveland, Ohio. The company states that this is an important step and that the new office is expected to become the principal branch of the Roberts & Abbott interests. There are now a number of large contracts for engineering being given attention from Chicago, and several additional large orders are in prospect. The Roberts & Abbott facilities include engineering for and plans and specifications of electric plants, power plants, heating and ventilating installations, investigations and reports on existing plants, water-power development, etc.

Mr. George Bancroft Kilbourne.

With great regret the Kilbourne & Jacobs Manufacturing Co. of Columbus, Ohio, announces the death of Mr. George Bancroft Kilbourne on November 22. Mr. Kilbourne went to Chicago on September 27 to take charge of his company's steel-car department. He graduated from Williams College in 1896, later serving as adjutant of the Fourth Ohio National Guard and saw active service in Porto Rico during the war with Spain. Since then he has been actively connected with the Kilbourne & Jacobs Manufacturing Co., being one of its directors, and his personal qualities won for him an enduring regard with his associates in that enterprise and those who had dealings with it.

Chesapeake Steamship Co.

The Chesapeake Steamship Co., Baltimore, Md., announces its tri-weekly service, winter schedule, for the York River Line. It states: "On and after Thursday, December 27, 1906, the daily service of the York River Line between Baltimore, West Point and Richmond, Va., will be discontinued, and until further notice steamers will be operated on a tri-weekly service, leaving Baltimore on Tuesdays, Thursdays and Saturdays at 5 o'clock P. M. and leaving West Point, Va., on Mondays, Wednesdays and Fridays at 5:50 o'clock P. M. Under this service landings on the York river will be made at Gloucester Point, Clements, Clay Bank and Allmond's every trip in each direction (weather and ice conditions permitting). The landing at Yorktown will be discontinued until further notice."

Offers Machinery, Tools and Supplies.

Demands continue to be numerous and large for construction machinery and tools, steam engines, electric motors, machine tools, woodworking machinery and other products needed in the industrial work of the day. Among the companies which keep in stock a varied line of the manufactures named is the Ives Manufacturing Company of Baltimore, Md. This company has at present many offerings of an attractive nature as to prices, yet the machines are of standard make and in good condition for operation. Its list includes wood and steel wheelbarrows, one-quarter-horse-power Crocker-

Wheeler generator, 10-horse-power Westinghouse electric motor, gas engines of 3, 4 and 5 horse-power; steam engines of 2 and 10 horse-power, etc. For complete list address the company.

Dr. Austen's Experimental Laboratories.

Manufacturers and industrial operators who at any time need the services of the consulting chemist will find of interest to them the announcement being distributed by Dr. Peter T. Austen of 89 Pine street, New York. Dr. Austen states that the Pine street address is the location of his offices and experimental laboratories, and refers to the fact that he has had 20 years' experience with leading manufacturers. He examines, tests and studies manufacturing processes and products at the works and in his laboratory in order to demonstrate how they may be improved and made more efficient, or how manufacturing can be effected more economically. In fact, Dr. Austen offers the services of the modern consulting chemist prepared to undertake any chemical work that arises in the industrial activity of our time.

Wesco Buys Davis Plant.

The Wesco Supply Co. of St. Louis has purchased the plant of the Davis Electric Manufacturing Co. of Springfield, Mass., including all machinery, finished and unfinished product. These are now being removed to St. Louis, where the manufacture of the Davis switches, as well as all of their other specialties, will be continued. The five-story factory building at 8th street and Clark avenue, St. Louis, has been leased for a term of years and is being equipped with the latest and most modern machinery and other equipment for manufacturing these specialties, as well as tablet boards, cut-out cabinets, switchboards, telephones and telephone accessories. The Wesco Supply Co. intends to have one of the most complete modern factories for the production of electrical specialties in the West, the product to represent the highest standard of efficiency and excellence. By January 15 the new plant will be in operation.

Removing to Larger Accommodations

This year it was found absolutely necessary to obtain better and larger accommodations for the Ideal Concrete Machinery Co. of South Bend, Ind., and the company is now preparing to remove to 106 North Mill street. It has taken a long lease on the old Bissell plow works, and has remodeled the plant, converting it into one of the most complete establishments of its character and size in Indiana. The Ideal Concrete Machinery Co., as is well known, manufactures the Ideal machinery for making concrete blocks and other building materials. It located at South Bend in February, 1905, occupying the first floor and basement of a building which in a few weeks it occupied entirely, the floor space amounting to 16,000 square feet. In two more years an additional building was being used for storage purposes. Then it was found necessary to have an entirely new establishment, and the plant referred to above is the result. Mr. Frank A. Borst, president, has recently resigned, but remains actively interested. The new officers are Mentor Wetstein, president and treasurer; George B. Pulfer, vice-president and general manager; J. Augustine Smith, secretary and sales manager. The company placed an order last week for 55,000 catalogues.

Ballinger & Perrot Completing Contracts.

Messrs. Ballinger & Perrot, architects and engineers, 1200 Chestnut street, Philadelphia, are completing a lithographing and printing building for the Friedenwald Company, Baltimore. The building is three stories high with basement, 80x120 feet, columns, floor and roof are of reinforced concrete, slag covering; walls are monolithic concrete, horizontal rustication and exterior surface is finished with pneumatic hammer. The power plant in the basement is equipped with three 150-horse-power boilers. A reinforced concrete stack 54 inches in diameter is built to a height of 100 feet. The plant is equipped with a 35,000-gallon sprinkler tank.

The reinforced concrete laundry building for G. L. Hooper & Son, Salem, Mass., is nearing completion. It is 60x100 feet, four stories and basement, columns, floor and roof of reinforced concrete, walls of concrete blocks; concrete piles are used in foundation and a self-supporting concrete chimney 48 inches in inside diameter and 100 feet high is located outside the building. Boiler-room is in the basement, with provision for two 150-horse-power boilers. The structure is equipped with freight elevator and improved laundry machinery. Messrs. Ballinger & Perrot were architects and engineers for this plant also.

For Steam-Plant Owners.

A suggestion whereby some steam-power plant owners may make money through the sale of a by-product and serve their neighbors at the same time is made by a Western company. This suggestion is: "In many small cities and towns that have not yet arrived at the dignity of a sewerage system and water-works there is located a steam-power plant. In very many of such communities the water-bearing stratum, whence the inhabitants obtain water for their domestic purposes, is at a lower level than the cess-pools. Consequently, where the intervenient strata are porous the liquid sewerage percolates to the water-bearing stratum and contaminates the domestic water supply. Typhoid fever cannot but be almost endemic in such cases, and the inhabitants will be ready to bless the man who will provide them pure drinking water at the low retail price of three gallons for 10 cents. If such power-plant man will visit the nearest ice plant he will find that the ice man condenses his exhaust steam, and, by means of a somewhat expensive refrigerating plant, congeals his condensation water into merchantable ice. On further investigation he will find that the ice man seldom realizes, at an average between wholesale and retail, \$3 per ton for his product, and that the peddling of the ice is both wasteful and expensive. A little figuring would satisfy him that at least 240 gallons of condensation water were required for each ton of ice, and that if he sells 240 gallons of condensation water at the rate of three gallons for 10 cents he will realize \$8 for his product, while his peddling can be done inexpensively and with little waste from the end of a tank wagon, while he is not at any expense for refrigeration." The Atmospheric Condensation Co. of Kansas City, Mo., has placed on the market a steam-condensing apparatus which is admirably suited for such an undertaking. It is ready to correspond with steam-power plant men who are desirous of knowing more about this plan for utilizing waste product.

Prominent Southern Plant Very Busy

Most all of the Southern manufacturing plants are busily engaged filling orders for their product, and some of them find it difficult to keep pace with demands. As is evidenced by current industrial news in the Manufacturers' Record, Southern factories are continually being enlarged in order that they may successfully meet present active conditions. One of the most prominent Southern enterprises is the Morris Sherman Manufacturing Co. of Chattanooga, Tenn., which has a complete modern plant and acts as engineer, machinist, boiler and plate-iron worker, designing and building complete steam plants, entire equipments for sand-lime brick works of any capacity, etc., besides being sole manufacturer of Sherman's patent compound boilers, hardening cylinders, automatic system for sand-lime brick, and various other specialties. This company has numerous contracts on file, sufficient, in fact, to keep its present plant busily occupied for some months. Its facilities have been doubled recently, and will doubtless be again enlarged soon. The company's recent large shipments included one of a sand-lime brick plant, 100,000 daily capacity, to San Francisco; one at Rockaway, N. J., and the Sherman plant is working day and night on a plant of 250,000 daily capacity for the Grant Brick Co., Brooklyn, N. Y. Two large export orders for sand-lime brick plants are on file. Another large contract for the Morris Sherman establishment calls for about 1500 tons of steel for the 12-story office building of C. E. James at Chattanooga, Tenn.

Monolith Bars for Reinforcing Concrete.

The Monolith Steel Co., Washington, D. C., has just issued an interesting catalogue dealing with its patented steel bars for reinforcing concrete. Considerable space is devoted to a technical description of the merits of this particular bar and much data is given to enforce its arguments. For this reason it should be of benefit to architects and engineers who desire to keep posted upon the latest improvements in reinforcing steel. The inventor of this system is J. F. Golding of Washington, D. C., who is already well known as the inventor of expanded metal, from which excellent results have been obtained. The catalogue contains many illustrations showing how the bars can be used for many purposes in building construction. In developing its system the company believes that it has overcome many disadvantages and that the bar as now placed on the market will insure a proper and accurate distribution of metal to resist all tensile strains, and it can be placed and maintained in position with mathematical accuracy and at a reasonable expense during the process

of placing the concrete. The Monolith Steel Co. does no construction work, but sells its bars to contractors or builders who have the necessary experience to do reinforced-concrete work, and to those who desire to use the Monolith bar engineering advice, plans, working drawings, etc., will be furnished so as to secure safe and economical results. Copies of the catalogue will be sent to interested parties upon application to the company's office in the Colorado Building, Washington, D. C.

"Stonemaking."

Much has been written about concrete construction by masters of this art and industry. But there is a saying that there "is nothing new under the sun," and it may be applied to concrete. The man who is to venture into the concrete-block business will naturally investigate as to whether it is a paying proposition. If he finds enough demand for blocks, he can enter, buy a block machine and make the product. Before he places his order, however, it is well for him to look into the merits of the various machines offered. The question of material is important, for suitable sand, gravel or crushed stone is not found in every locality. In some places there is a splendid clean, sharp sand and gravel found in large deposits. In others there are stone crushers, the screenings from which may be used. Again, it may be necessary to install a small crushing plant. Any good Portland cement will be found satisfactory, although some may cost more than others on account of freight charges, because of the distance the factory is located from the block plant. Concrete is a mass of aggregates, graded in size from the largest pieces to the smallest, with just enough of the smaller and smallest ones to completely fill the voids between the larger ones, and each and every particle completely coated with cement properly tempered with water. Look well to the grading of materials. Walls are sometimes damp, and when the cause is ascertained it will be learned that while there was cement enough, sand enough, and possibly mixing, tamping and curing enough, the grading of the aggregates was neglected. The result is that the blocks are of a spongelike nature, and capillary attraction assists in making the walls wet. Concrete is used for fireproofing and been found better than any other material for that. Does the concrete-block business pay? Under ordinary conditions, yes. Under adverse conditions, no. Competition in low prices for lumber, brick and stone reduces the price obtainable for concrete blocks, and the manufacturer cannot sell the product. To overcome this the advice is given to use a machine which will be the acme of economy in the manufacture of the block, yet turn out a product perfect beyond any doubt. If a two-man machine does not pay, save half your labor cost by installing a one-man machine and turn out as many blocks in the same length of time. The inventors of the Pettyjohn block machine claim this idea has revolutionized the block business. They move the machine, not the block, and further say "the advantages of moving the machine is apparent to anyone who ever saw a block machine at work. It is easier to handle the machine, which weighs less than the block it makes, and there is no danger of the block being injured. Concrete when freshly made is no stronger than so much wet sand, and should not be disturbed under any circumstances till the cement has sufficiently set to prevent any danger of breakage in handling. Another item of economy of this system is that the mold box rests on the ground, where it is easier filled with material than if it rested on a table or bench, and the operator can tamp the mass much easier and better. Take the raw material to the machine, make the block and let it alone, but move the machine to the next pallet and repeat the operation. These points represent much experimental work, and the result is a machine which will make a good block at the least cost and enable the user to compete with other building materials." The Pettyjohn Company of Terre Haute, Ind., has recently published its fifth edition of "Stonemaking," which describes the Pettyjohn machine, and the information contained therein is well worth obtaining. You can have one for the asking.

TRADE LITERATURE.

Graphite Pipe-Joint Compound.

Dixon's graphite pipe-joint compound is useful to pipefitters, engineers, machinists, contractors, manufacturers, plumbers, boiler and engine makers and others. It is fully described in a neat booklet issued by the Joseph Dixon Crucible Co. of Jersey City, N. J., the manufacturers of the compound. Send for booklet.

Ideal Power—The Magazine.

The December number of *Ideal Power*, the monthly magazine devoted to compressed-air and electrical appliances, is being distributed. This latest issue contains considerable data of interest to people who are concerned in the success being met with in the use of compressed-air and electric machinery and tools. *Ideal Power* is published by the Chicago Pneumatic Tool Co. of Chicago and New York.

The Ridgepole Again Current.

People interested in roofing and roofing materials should read the December number of *The Ridgepole*. This popular little publication makes its appearance for the current month with the usual complement of instructive data regarding the use of roofing materials. It especially tells about the superior qualities of Rex Flintkote roofing. For a copy address the well-known roofing manufacturers, Messrs. J. A. & W. Bird & Co., Boston, Mass.

From the Allis-Chalmers Company.

The steam-engine department of the Allis-Chalmers Company, Milwaukee, Wis., is issuing Bulletin No. 1503, which gives particulars regarding the Allis-Chalmers direct-connected Reynolds Corliss engines—"Reliance" pattern. Photographic views are presented and the machine is described in detail. People who are interested in power machinery of this class should not fail to have a copy of Allis-Chalmers Bulletin No. 1503 for their files.

Imperial Type 10 Air Compressors.

Those who are active in branches of industry wherein air compressors are required will find interesting data for their consideration in catalogue X36 of the Ingersoll-Rand Company, 11 Broadway, New York. This catalogue gives all the details about the Rand "Imperial" type 10 air compressors—steam and power-driven. It shows the construction and operation of these machines and emphasizes the fact that the manufacturer produces the various compressors on an absolutely interchangeable plan. This insures prompt repair to and replacing of any part.

The Case Electric Cranes.

A form of equipment for which the demand steadily increases is the electric crane. These devices are now largely used in all kinds of industrial work and manufacturing. The designs built by the Case Manufacturing Co. of Columbus, Ohio, have a reputation for efficiency which is bringing the manufacturer more orders every day. The Case electric cranes are illustrated and described in Bulletin No. 22 now being distributed. This publication contains a number of photographic reproductions showing the many improvements the company has made in cranes of recent manufacture, and refer to the fact that the Case works have recently been remodeled and the equipment has been considerably added to in order to facilitate the production of cranes for all purposes.

Proper Care of Belts.

The cost of belting is a very considerable item of expense in shop maintenance. To neglect the belts results in a twofold loss: First, a waste of power due to inefficiency of the belts; second, increased cost due to frequent belting renewals. It should be remembered that belting economy does not end with the purchasing. The belt is worth its cost price only as long as its original condition of life and pliability is preserved. Belts usually slip from one of two reasons: First, because they are overloaded, and, second, because they are dirty, clogged up, glazed, dried out or otherwise neglected. To prevent these difficulties belts must be properly cared for. Valuable data in this connection is presented in "The Proper Care of Belts," a pamphlet issued by the Joseph Dixon Crucible Co. of Jersey City, N. J. Send for one.

Edison Portland Cement Co.

A leaflet now being distributed by the Edison Portland Cement Co. presents some data of interest to construction engineers, contractors and others who specify and need Portland cement of high quality. The company named has been particularly successful in marketing its output and refers to this as the finest ground Portland cement—82 to 85 per cent. through 200-mesh sieve, 98 to 99 per cent. through 100-mesh sieve. It is claimed the cement is superior in fineness, color and strength and will carry 10 per cent. more sand than other leading brands. The Edison Portland Cement Co. has its works at New Village, N. J.; sales offices in the Real Estate Trust Building, Philadelphia; St. James Building, New York; Machesney Building,

Pittsburg, and Edison Laboratory, Orange, N. J. The company's president is Thomas A. Edison.

The Diamond Drill—Its Work.

"The Diamond Drill and Its Work" is the title of an illustrated pamphlet which will prove interesting to all who are concerned in the use of diamond drills. It refers to the diamond drill as indispensable for all prospecting and testing purposes, and that progressive mine owners and engineers all over the world are making more and more extensive use of this machine every year, realizing its value for obtaining absolute records of strata. The subject is treated at length, and the pamphlet also comprises the catalogue of the American Diamond Rock Drill Co., 35 Liberty street, New York. This company has been for years engaged in making diamond-pointed core drills, and its success in its special field of endeavor has been marked in the industrial field. It will send copies of the publication to applicants interested in diamond-drill work.

Pike Manufacturing Co. Publications

Among recent publications circulated to the mechanical industries and to dealers in supplies those industries need are the catalogues of the Pike (N. H.) Manufacturing Co., New York offices at 151 Chambers street. One catalogue is confined to illustrations and descriptions of the comprehensive line of corundum wheels manufactured by the company and which have come into extensive use throughout the industrial world. The other tells of the oilstones, scythes, razors, hones, emery wheels, corundum wheels and abrasives manufactured at the Pike works. Products bearing the Pike trademark are known for their excellence wherever sharpening and abrasive materials and tools are required, and an examination of the two publications mentioned but emphasizes the claims of the company for the comprehensive character of its output.

The International Oil Engine.

Those who are interested in power machines using oil as fuel will find timely information for their consideration in the new catalogue of the International Oil Engine Co., 38 Murray street, New York. This catalogue is fully illustrated and describes in detail the oil engines built by the company. Besides presenting copies of letters from people who have installed the company's engines and obtained full satisfaction from their use. The International oil engine is of the type commonly known as two cycle and receives an impulse at each down stroke of the piston. This system is followed out and various original features have been adopted which combine to produce an efficient and economical power machine for all purposes—electric lighting, factory operations, pumping for irrigation, air compressors, mining hoists and drills, farming machinery, etc. Catalogue may be obtained on application.

Flue Lining for Rotary Kilns.

High-grade refractory materials for lining cement rotary kilns form a subject of interest to certain branches of industry. The flue lining of rotary kilns, such as are used in cement mills, is especially of interest at this time. Because of this it is desired to call attention to a pamphlet which the Laclede Fire Brick Manufacturing Co. has issued. This publication calls attention to the use of beauxite blocks for lining the hot zones of rotary Portland-cement kilns. The company instituted a test at the plant of the St. Louis Portland Cement Co., and now after a year finds itself in a position to give the results, which are shown to have been unusually satisfactory. A detailed description of this test is presented, and the results are such as to warrant the investigation of all manufacturers who want to line their rotary kilns with materials that will ensure long life, thus adding to the efficiency of the equipment and, consequently, effecting desired economies in manufacturing. Requests to the Laclede Fire Brick Manufacturing Co. at St. Louis, Mo., will bring a copy of the pamphlet referred to.

Buckeye Valves and Valve Fittings.

For more than 30 years the Buckeye mechanical brass goods have been manufactured. The maker has constantly directed its efforts that the products should always embody and represent the best that careful design, good material, accurate tools and skilled workmen could devise and produce. From year to year these products have been improved and the specialties added to until today the comprehensive breadth and scope of the Buckeye products are almost beyond the realization of even the manufacturer. The Buckeye Iron and Brass Works of Dayton, Ohio, is the manufacturer referred to. The company has just issued a new cata-

logue, which will interest engine builders and steamfitters. This publication is one of the most creditable specimens of the printers' art in trade literature recently issued. It is devoted to valves and valve fittings. It is replete with numerous photographic illustrations, is handsomely bound in cloth and has 129 9x12-inch pages. Altogether, the book is practically a compendium for buyers of valves and valve fittings used in engine building and steamfitting.

Improved Hand Telephone Equipment

Appreciating the advantages and convenience in the use of the hand telephone for many purposes and in places where it has heretofore been impracticable owing to its limited scope, there has been produced an instrument of this type said to be equal in efficiency for transmitting and receiving to that of any other type of instrument, either for local or long-distance service. Objectionable features in previous hand telephones have been eliminated and, having had these improved equipments in continuous service for two years, the manufacturer offers them to the public as entirely practicable. It is believed they will come into extensive use for the desk, the home and the office. Wide-spread interest has been shown in these phones, and to meet numerous requests for information regarding their improved features and the methods of construction the manufacturer has issued a descriptive and illustrative bulletin of details. The hand telephone equipment mentioned is made by the Wire & Telephone Co. of America, Rome, N. Y., which invites requests for the pamphlet. The "Easophone" is the name given the new instrument.

Ingersoll-Sergeant Compressors.

A catalogue of 184 pages, covering the complete line of Ingersoll-Sergeant compressors as built by the Ingersoll-Rand Company, has recently been issued. A very brief description of each of the nine classes is given, followed by tables of sizes, etc., and illustrations of typical machines and representative plants. An unusual feature of this publication is the number of actual illustrations of machinery covering almost every line of industrial activity. Two very important articles of an engineering character are included. The first of these deals with "Some Important Elements of Economy in the Straight Line and Duplex Types of Compound Air-Compressors." This is a new presentation of this important subject and, being offered by the Ingersoll-Rand Company, which builds both types of machines, may be accepted as authoritative. The other article is on "Compound-Air Compression," and goes exhaustively into the details of this important subject, emphasizing its advantages and giving a word of warning against those constructions in which simplicity and reliability are sacrificed to a mistaken idea of economy. Some other important subjects discussed are "Air Receivers and Pressure Tanks," "After-coolers," "Air Reheaters," "Air-Compressor Valves" and "Compressor Regulators." Several pages are devoted to new and valuable tables of information on compressed air. The Ingersoll-Rand Company has aimed in this publication to make not merely a trade catalogue of its compressors, but a text-book of useful information to engineers. Obtain copies by addressing the Ingersoll-Rand Company, 11 Broadway, New York.

Augusta to Have a Pottery.

As a result of the recent agitation in Augusta, Ga., for the establishment of a modern pottery in that city the Hahn Pottery Co. will be organized. This enterprise will be under the management of Messrs. T. L. Hahn and H. Russell Cohen, the former to be manager and the latter to be secretary-treasurer. They have awarded contracts for about \$5000 worth of machinery, and expect to have the plant in operation about March 1. Mr. Hahn has been operating a small pottery for the manufacture of jugs at North Augusta, S. C., opposite Augusta, Ga., and his success with that plant resulted in a definite decision for the new and larger company. Contracts for the erection of the buildings will be awarded during the next 10 days, and it is interesting to add that the mechanical equipment will be operated by electricity. The company has purchased a site in North Augusta and sufficient clay in beds to last 20 years.

During the last four months of this year 19,824,519 pounds of tobacco were sold at Danville, Va.

MISSOURI LEAD AND ZINC.

Production More Than Doubled in Six Years.

[Special Cor. Manufacturers' Record.]
Carthage, Mo., December 22.

At the close of the year 1906 the Southwest Missouri lead and zinc mining district shows an unprecedented development. The remarkable growth of the industry, the surplus production from which has increased in six years from \$7,000,000 to \$15,000,000, shows now the recent influx of larger capital and an extension of boundary in the activity that speaks volumes for a wonderful near future.

In the Duenweg district, which in the past two years has developed in leaps and bounds into one of the foremost sections of the district, the Cathedral Mining & Smelting Co. has just located, with a capital stock of \$1,500,000. The new company's production will help the district output materially. The company is a New York corporation of which Samuel F. B. Morse of New York is president and James P. Newell of Carthage, Mo., vice-president. The company had filed articles of incorporation in this State, and will begin next week sinking six new shafts. Among the more important properties which the company owns are the Chapel mine lease on the former Whitsett land, near Porto Rico; the Wood 40-acre tract near Duenweg, which has developed wonderfully during the past year; the Vestry and Mission mine leases in the Duenweg district and the Dandy Jim lease on the Newell-Morse land. All this property is developed land in the sheet-jack district, and Mr. Newell on his return from New York today announced his intention to let contracts within the next few days for the six new mills of 500 tons capacity each daily.

And thus it is as the larger companies take up the developed land the smaller prospectors scatter out, and the developed area has extended with a rapidity almost undreamed of. Mining operations which formerly were practically confined to the south end of Jasper county are now so developed that from Purcell, in the northwest corner of the county, along the Carthage & Western, to Carthage, and on southeast along the Frisco to Sarcoxie, there are frequent activities. The Purcell-Neck City-Alba camp three years ago numbered 500 people with two mines; today it has 5000 people with 25 mines. At Carthage the prospecting is centered around the Pleasant Valley mines, which are located one mile southwest of the city. At Reeds a number of prospects are being developed, and the same is true at Russell. With ore at a high price this district has never seen such activity as at present. As a result of the increased development, which began in earnest five years ago and has without interruption accelerated to now, of the three principal towns in this county, Joplin has grown from 26,023 to 35,000, Carthage from 9416 to 15,090, Webb City from 9201 to 12,000, and the little towns are increased in population to the point of bursting.

The saved-stone interests at Carthage have kept pace with the mining. Within the last year three new quarries have been opened here, in addition to the nine which the last few years have output about 2000 cars of saved stone annually, besides the rough-hammered and crushed-stuff products. Manufacturing, like the mining, has doubled in the five-year period. The natural gas which has made its advent within the last two years is responsible for a large growth in various industrial departments. The gas is furnished to manufacturers at 12½ cents per 1000 feet.

ROY A. HOCKENSMITH.

Greenwood, S. C.

A special Christmas edition of the Greenwood (S. C.) Journal gives an in-

teresting account of what that city has done and is doing in keeping step with other progressive cities of the South. The industrial and residential advantages of the city have been attractively set forth. Greenwood has one of the largest cotton-seed-oil mills east of the Mississippi, two large cotton mills, handkerchief factory, fertilizer factory, four banks and many other enterprises of a flourishing character.

Opportunity for Manufacturers.

The MANUFACTURERS' RECORD is informed that there is a large veneer plant at Winston-Salem, the by-product of which is available for utilization by other manufacturers. This by-product, being a surplus, can be purchased at low prices, and a good site for a factory is obtainable adjacent to the veneer plant. Crates, split baskets and other articles of that character could be manufactured. Information regarding this opportunity can be obtained by addressing the secretary of the Board of Trade, Winston-Salem, N. C.

FINANCIAL NEWS

The MANUFACTURERS' RECORD invites information about Southern financial matters. Items of news about new institutions, dividends declared, securities to be issued, openings for new banks, and general discussions of financial subjects bearing upon Southern matters.

Review of the Baltimore Market.

Office MANUFACTURERS' RECORD,
Baltimore, Md., December 26.

In the Baltimore stock market during the past week business was dull preceding the Christmas holidays.

United Railways common sold from 13¼ to 13½; the trust certificates from 14 to 13¾; the income bonds from 57½ to 58¼; the funding 5s from 87¼ to 86½; the funding scrip from 87¼ to 86¼; the 4s from 88¼ to 88¾. Seaboard new common was dealt in from 22 to 23; the second preferred from 48 to 50; Seaboard 4s from 81½ to 81; the 10-year 5s at 100; Consolidated Cotton Duck preferred, 33 to 34; G. B. S. Brewing incomes from 30¾ to 29½, and the firsts from 58¼ to 57; Cotton Duck 5s at 83¼.

Fidelity & Deposit sold at 130½ to 130, and United States Fidelity from 110½ to 107, with last sale at 108¼; First National Bank at 139.

Other securities were traded in as follows: Atlantic Coast Line 4s, 97 to 97¼; Atlantic Coast Line (Conn.) 5s, certificates, 108¼ to 108½; Atlantic Coast Line stock, 137; Houston Oil common, 9; do. preferred, 48; Atlanta & Charlotte 1sts, 103¾; Atlanta Consolidated Street Railway 5s, 106; Virginia deferred, Brown Bros. certificates, 23; Alabama Consolidated Coal & Iron preferred, 93; Consolidation Coal, 95; Augusta Railway & Electric 5s, 101¼; City & Suburban 5s, Baltimore, 108¼; Western Maryland 4s, 83¼; Northern Central Railway stock, 107½ to 108; Norfolk & Portsmouth Traction, 27; Anacostia & Potomac 5s, 104 to 103½; City & Suburban 5s, 108¼; Newport News & Old Point 5s, 90; Northern Central 4½s, 108; Alabama Consolidated Coal & Iron 5s, 91¼; Columbia & Greenville 1sts, 114¼.

SECURITIES AT BALTIMORE.

Last Quotations for the Week Ended
December 26, 1906.

Railroad Stocks.	Par.	Bid.	Asked.
Atlantic Coast of Connecticut	100	...	330
Georgia Southern & Florida	100	35	37½
Georgia Sou. & Fla. 1st Pfd.	100	97	98
Georgia Sou. & Fla. 2d Pfd.	100	82	84
Seaboard Company Common	100	22½	23½
Seaboard Company 1st Pfd.	100	...	84
Seaboard Company 2d Pfd.	100	48½	50
United Railways & Elec. Co.	50	13	13¾
Bank Stocks.			
Drovers & Mech. Nat. Bank	100	240	...
Maryland National Bank	100	20	20½
Merchants' National Bank	100	...	178
National Bank of Baltimore	100	117	...
National Exchange Bank	100	...	182½

National Howard Bank	100	12½	...
National Marine Bank	100	38	...
National Mechanics' Bank	100	26	...
National Union Bank of Md.	100	114	120

Trust, Fidelity and Casualty Stocks.

American Bonding & Trust	50	42	43
Fidelity & Deposit	100	...	130
Fidelity Trust	100	29½	225
Union Trust	50	55	...
U. S. Fidelity & Guaranty	100	107½	...

Miscellaneous Stocks.

Ala. Con. Coal & Iron	100	...	62¼
Ala. Con. Coal & Iron Pfd.	100	92	93
Con. Cotton Duck Common	50	...	13
Con. Cotton Duck Pfd.	50	33	33½
Con. Gas, Elec. Lt. & P. Com.	35
Con. Gas, Elec. Lt. & P. Pfd.	80	...	80
G. B. S. Brewing Co.	100	6	7½

Railroad Bonds.

Atlanta & Charlotte 1st 7s, 1907	103½	104
Atlantic Coast Line 1st 4s, 1863	97	97½
Atlantic Coast Line (Conn.) 5s	108½	...
Carolina Central 4s, 1909	94	96
Char. Col. & Aug. 1st 5s, 1910	115½	...
Char. Col. & Aug. 2d 7s, 1910	109	...
Coal & Iron Railway 5s, 1920	...	105½
Col. & Green 1st 6s, 1916	114	...
Georgia & Alabama 5s, 1945	109½	110¼
Georgia, Car. & North. 1st 5s, 1920	110	110¼
Georgia Pacific 1st 6s, 1922	120	...
Georgia Sou. & Fla. 1st 5s, 1945	...	112
Maryland & Potomac 5s, 1891	115	...
Petersburg, Class A 5s, 1926	124	126
Piedmont & Cum. 1st 5s, 1911	102	...
Potomac Valley 1st 5s, 1941	113	...
Richmond & Danville Gold 6s, 1915	114	115
Seaboard Air Line 4s, 1950	81	81½
Seaboard Air Line 5s, 1911	100	100½
Seaboard & Roanoke 5s, 1926	110	...
Virginia Midland 2d 6s, 1911	108	109
Virginia Midland 5th 5s, 1926	111¼	...
Western Maryland new 4s, 1952	82¾	83¼
W. Va. Central 1st 6s, 1911	107	...
Wilmingt. & Wel. Gold 5s, 1935	116½	117¼

Street Railway Bonds.

Anacostia & Potomac 5s, 1949	102½	103½
Atlanta Con. St. Rwy. 5s	106½	107½
Augusta Rwy. & Elec. 5s, 1940	100½	101½
Baltimore Traction 1st 5s, 1929	112½	...
Citizens' Rwy. & Light of N. N.	93	...
City & Suburban 5s (Balto.), 1922	108½	109½
Lexington Rwy. 5s, 1949	99½	100½
Newport News & Old P. 5s, 1938	113	...
North Baltimore 5s, 1942	113	...
United Railways 1st 4s, 1949	88¾	88¾
United Railways Inc. 4s, 1949	57¾	58
United Railways Funding 5s	86½	86¾

Miscellaneous Bonds.

Ala. Con. Coal & Iron 5s	...	91½
Con. Gas 6s, 1910	106¼	...
Con. Gas 4½s	95	96½
Con. Gas, Elec. Lt. & P. 4½s	81½	84
G. B. S. Brewing 1sts	57	57½
G. B. S. Brewing 2d Inc.	28¾	29½
Mt. V. & Woodry's Cot. Duck 5s	83¾	84
United Elec. Lt. & P. 4½s	...	95

SOUTHERN COTTON-MILL STOCKS

Quotations Furnished by Hugh Mac-
Rae & Co., Wilmington, N. C., for
Week Ending December 24.

	Bid.	Asked.
Abbeville Cotton Mills (S. C.)	94	95
Aiken Mfg. Co. (S. C.)	80	81½
Anderson Cotton Mills (S. C.)	100	...
Arkwright Mills (S. C.)	122	...
Augusta Factory (Ga.)	80	85
Avondale Mills (Ala.)	109	116
Belton Mills (S. C.)	106	110
Bibb Mfg. Co. (Ga.)	122	...
Brandon Mills (S. C.)	126	...
Cabarrus Cot. Mills (S. C.) new	120	120
Chadwick Mfg. Co. (N. C.) Pfd.	102	102
Chiquola Mfg. Co. (S. C.)	99	100
Clifton Mfg. Co. (S. C.)	122	124
Clifton Mfg. Co. (S. C.) Pfd.	102	105
Clinton Cotton Mills (S. C.)	151	...
Columbus Mfg. Co. (Ga.)	96	101
Courtenay Mfg. Co. (S. C.)	100	...
Dallas Mfg. Co. (Ala.)	92	95
Darlington Mfg. Co. (S. C.)	61	62½
Eagle & Phenix Mills (Ga.)	130	135
Easley Cotton Mills (S. C.)	132	138
Enoree Mfg. Co. (S. C.)	80	80
Enoree Mfg. Co. (S. C.) Pfd.	99	101
Enterprise Mfg. Co. (Ga.)	86	92
Exposition Cotton Mills (Ga.)	200	...
Gaffney Mfg. Co. (S. C.)	92	96
Gainesville Cotton Mills (Ga.)	37	40
Granby Cot. Mills (S. C.) 1st Pfd.	...	55
Graniteville Mfg. Co. (S. C.)	165	...
Greenwood Cotton Mills (S. C.)	120	122½
Grendel Mills (S. C.)	117	120
Henrietta Mills (N. C.)	200	...
King Mfg. Co., John P. (Ga.)	97	103
Lancaster Cotton Mills (S. C.)	105	107
Lancaster Cot. Mills (S. C.) Pfd.	97	99
Langley Mfg. Co. (S. C.)	92	96
Laurens Cotton Mills (S. C.)	...	166
Limestone Mills (S. C.)	115	...
Lockhart Mills (S. C.)	101	107
Lockhart Mills (S. C.) Pfd.	100	100
Louise Mills (N. C.)	90	95
Louise Mills (N. C.) Pfd.	98	98
Marlboro Cotton Mills (S. C.)	90	96
Mayo Mills (N. C.)	165	185
Mills Mfg. Co. (S. C.)	100	105
Mills Mfg. Co. (S. C.) Pfd.	99	101
Monaghan Mills (S. C.)	107	102
Newberry Cotton Mills (S. C.)	107	...
Norris Cotton Mills (S. C.)	108	110
Olympia Cot. Mills (S. C.) Pfd.	...	80
Orangeburg Mfg. Co. (S. C.) Pfd.	80	97
Orr Cotton Mills (S. C.)	101	104
Pacolet Mfg. Co. (S. C.)	190	190
Pacolet Mfg. Co. (S. C.) Pfd.	101½	104
Pelzer Mfg. Co. (S. C.)	170	173
Piedmont Mfg. Co. (S. C.)	170	177
Poe Mfg. Co. (S. C.)	121	...
Richland Cot. Mills (S. C.) Pfd.	...	52½
Raleigh Cotton Mills (N. C.)	99	105
Roanoke Mills (N. C.)	...	140
Saxon Mills (S. C.)	109	...
Sibley Mfg. Co. (Ga.)	64	68
Southern Cotton Mills (N. C.)	...	80
Spartan Mills (S. C.)	145	155
Springfield Mills (S. C.)	190	190
Trion Mfg. Co. (Ga.)	120	142
Tuapau Mills (S. C.)	180	200
Union-Buttles Mills Co., 1st Pfd.	75	90
Victor Mfg. Co. (S. C.)	124	130
Warren Mfg. Co. (S. C.)	99	100
Warren Mfg. Co. (S. C.) Pfd.	105	107
Washington Mills (Va.)	90	...
Washington Mills (Va.) Pfd.	100	115
Whitney Mfg. Co. (S. C.)	145	150

Bank Reports.

The Austin National Bank of Austin, Texas, reported at close of business November 12, 1906, loans and interest-bearing securities, \$1,647,780; available cash, \$1,557,205; capital, \$150,000; surplus and profits, \$315,676; circulation, \$150,000; total deposits, \$2,600,325; total resources, \$3,216,001. E. P. Wilnot is president; Walter Tips, vice-president; Henry Hirschfeld, second vice-president; Wm. H. Folts, cashier, and M. Hirschfeld, assistant and cashier.

New Corporations.

The People's Bank is being organized at Rocky Mount, Va., by N. P. Angle.

The Bank of Mulberry is reported organized at Mulberry, Fla., with \$25,000 capital.

It is reported that parties from Yoakum and Shiner propose to establish a bank at Hallettsville, Texas.

It is reported that a new building and loan association is being organized at Salisbury, N. C., by Alderman L. E. Heilig.

The Folkston Bank at Folkston, Ga., a branch of the Liberty Banking Co. of Ludowici, has begun business with L. M. Mizell cashier.

The Bank of Stella at Stella, Mo., has

been incorporated with \$10,000 capital by J. C. Lentz, James Carter, J. L. Montgomery and others.

A national bank with \$25,000 capital has been organized at Croon, Texas, by John W. Knoorp, Walter Knoorp, Wesley Knoorp and F. B. Blasdeli.

The Southern Loan & Security Co. of Dallas, Texas, capital \$10,000, has been incorporated by Robert T. Meader, John C. Saner and R. E. L. Saner.

The Comez State Bank of Comez, Texas, has been organized with \$10,000 capital. The incorporators are J. J. Adams, J. T. Gainer, R. Holgate and others.

The Bank of Liberal at Liberal, Mo., has been chartered with \$10,000 capital. The stockholders are P. G. Baulmere, J. G. Todd and others of Liberal.

The Etowah Trust Co. of Rome, Ga., capital \$1000, has made application for a charter. John W. Ledbetter and R. T. Fouché are among the incorporators.

A new bank with \$100,000 capital is reported being organized at Bristol, Va. Geo. L. Carter, president of the South & Western Railway, Bristol, Tenn., is interested.

The S. Lemon Banking Co. of Acworth, Ga., capital \$30,000, has been granted a charter. The incorporators are J. L. Lemon, Orlando Awtry and James W. McMillan.

The Yatesville Banking Co. of Yatesville, Ga., has been chartered with \$25,000 capital. The incorporators are L. T. Matthews, James E. McNeice, A. A. Crawford and others.

The First State Bank of Oran, Texas, has elected the following directors: H. N. Frost, president; P. E. Bock, vice-president; W. I. Smith, D. P. Rankin and J. W. Register.

The Bank of Pine Level at Pine Level, N. C., has been organized with \$25,000 capital. D. B. Oliver is president; Berry Godwin, vice-president, and R. L. Fitzgerald, cashier.

The First National Bank of Hemphill, Texas, is to begin business about January 1 with \$25,000 capital. J. O. Toole is president; J. H. Synnott, vice-president, and A. M. Jones, cashier.

The Americus Trust and Savings Bank of Americus, Ga., capital \$25,000, has been chartered by M. M. Lowery, Crawford Wheatley, L. P. Harrold, R. E. McNulty and L. A. Lowery.

The Southern Mercantile Co. of Emerson, Ark., has been incorporated with \$10,000 capital. W. J. Malock is president; W. A. Rushton, vice-president, and Leonard Lee, secretary and treasurer.

The Central Investment Co. of Houston, Texas, capital \$10,000, has been incorporated by Abe Gordon, L. Freedman, Ike Blieden, A. Blieden, George Shapiro, Sol Gordon and Burris Litewich.

The First State Bank of Skidmore, Texas, has been incorporated with \$10,000 capital by J. B. Hunter, Louis Walker, John M. Corrigan, all of Skidmore; Lon Dee and J. H. Carlisle of Papatote, Texas.

The Citizens' National Bank of Eureka Springs, Ark., has been approved; capital \$50,000. The organizers are William M. Duncan, Eldon M. Bare, Myron D. Jordan, Theodore L. Hawley and G. Grant Swett.

The Commercial National Bank of Brady, Texas, has been approved; capital \$100,000. The organizers are W. D. Crothers, George R. White, Francis M. Newman, Willie N. White and Paul Wiloughby.

The Huntington Loan Co. of Huntington, W. Va., has been chartered with \$25,000 capital. The incorporators are William Chaffin, L. L. Doolittle, Grace B. Staley, C. C. Curtis and Rufus Switzer, all of Huntington.

The National Exchange Bank of Ches-

ter, S. C., has been authorized to begin business with \$100,000 capital. J. L. Glenn is president; S. M. Jones, vice-president; M. S. Lewis, cashier, and B. M. Spratt, Jr., assistant cashier.

The Nicholson Bank & Trust Co. of Union, S. C., which is to succeed the banking firm of William A. Nicholson & Son, has been granted a commission; capital \$100,000. The petitioners are Emslie Nicholson, R. E. Nicholson and George C. Perrin.

The Bank of Lilesville at Lilesville, N. C., is to begin business in about 60 days with the following directors: J. S. Alexander, president, and H. J. Wall, vice-president; E. P. Liles, J. E. Kerr, J. L. Wyatt, J. A. Lindsey, T. C. Cox, J. W. Boggan and A. P. Liles.

The Bank of Bogalusa at Bogalusa, La., has been incorporated with \$30,000 capital. The directors are W. G. Dorsey, C. Ellis Ott, L. T. Richardson, Lewis P. Rice, O. D. Richardson, W. P. Stewart, E. W. Ott, J. K. Johnston, James Robert Leslie, Silas Jenkins and J. H. Dixon.

The Savings, Loan and Deposit Bank of Johnson City, Tenn., recently chartered with \$100,000 capital, is to begin business about January 15. Among the stockholders are Geo. L. Carter, Judge S. J. Kirkpatrick, Jas. A. Summers, Henry C. Jackson, Guy S. Shoun, F. K. Mountcastle.

The Real Estate Loan Co. of Galveston, Texas, has filed its charter; capital \$100,000. The incorporators are Maco Stewart, I. Lovenberg, R. Waverly Smith, Robert Palliser, Fred C. Pabst, Frank Jones, R. J. and F. S. Dreyfus, A. H. Newman and John E. Boddeker, all of Galveston.

The Capital City Bank of Charleston, W. Va., capital \$250,000, has been granted a charter. The incorporators are Enoch Smith, J. C. Morrison, L. M. La Follette, Peter Silman, J. F. Butts, N. S. Burlew, Charles F. Sterrett, M. Goldbarth, Wm. Prince, C. W. Dillon, Wm. B. Mathews, Geo. S. Laidley, Frank Cox, G. W. Atkinson and Daniel Matthews.

The Lonoke County Bank at Lonoke, Ark., capital \$50,000, is to begin business about January 1 with the following officers: A. J. Walls, president; Chas. G. Miller, vice-president; A. C. Custic, secretary and treasurer; T. D. Bransford, cashier, and W. W. McCrary, T. D. Bransford, T. C. Trimble, Jr., and John R. Cumming, directors.

The officers of the Bank of Rogersville at Rogersville, Ala., which recently began business with \$15,000 capital, are Ira A. Beddingfield, president; J. N. Lutz, vice-president; J. N. Howard, cashier; directors, Ira A. Beddingfield, J. N. Howard, Dr. J. L. Weaver, Dr. J. C. Belew, B. C. Boston, J. L. Ingram, J. N. Beddingfield, Peter Cox, J. A. Lentz and W. T. Weaver.

The Merchants and Farmers' Bank of Nicholls, Ga., capital \$50,000, has elected the following directors: George W. Deen, president; J. A. Davis, first vice-president; John Lott, Sr., second vice-president; F. G. Jones, cashier; D. H. Meeks, D. Kirkland, Daniel Hall, John Roberts, J. W. Prince, Q. Douglas and J. L. Wilcox. A later report says the bank has opened for business.

The Bank of Moore at Carthage, N. C., has been granted a charter; capital \$15,000. Among the stockholders are C. S. Brewer, W. G. Jennings, J. P. Leonwell, J. R. McAuley, Chas. McLeod, Geo. W. McNeill, J. S. Womble, H. P. McPherson, M. McL. Keithan, W. S. Griffin, Sinclair Bros., J. V. Larkins, J. W. Wilcox, Geo. H. Humber, J. C. Larkins, W. H. Jackson, D. McS. Kelly, J. H. Howell, H. B. Shields and J. Alton McIver.

The Reidsville Insurance & Realty Co. of Reidsville, N. C., has been incorporated with \$50,000 capital. The incorporators are E. P. Wharton, Greensboro; J. N.

Craig, P. B. Johnson, P. W. Geidewell, John T. Oliver, G. W. Jackson, James T. Daily, J. A. Scales, James M. Walker, W. M. Giles, R. S. Montgomery, William Young, L. T. Smith, J. N. Hester, R. T. Williams, J. W. Dameron, J. H. Burton, J. W. McGehee, Charles A. Whitsett, all of Reidsville, and G. A. Miller, Danville.

Among the stockholders of the Merchants and Farmers' Bank of Garysburg, N. C., chartered with \$7500 capital, are A. J. Ellis, J. B. Collier, J. E. Suiter, R. H. Joyner, J. H. Fitzhugh, W. W. Grant, J. L. Lifsey, W. D. Ellis, J. N. Ayres, Jr., S. E. Daniels, Frank Clements, J. A. Hawks, W. H. Camp, J. A. Barham and others of Garysburg, B. W. Vincent and Mrs. H. W. Vincent of Vulture, J. W. Magee, J. E. Morgan, C. A. M. Floyd, J. W. Crew, P. E. Stephenson, W. B. Crew, L. A. Jordan of Pleasant Hill, J. G. McNeal of Norfolk, Va., and 10 persons at Emporia, Va.

New Securities.

Andalusia, Ala.—An issue of \$20,000 of school-building bonds has been voted.

Anderson, S. C.—The MANUFACTURERS' RECORD is informed that the city contemplates issuing \$75,000 of sidewalk improvement bonds. J. L. Sherard is City Clerk.

Asheville, N. C.—Buncombe county will, it is said, issue \$25,000 of road bonds.

Baltimore, Md.—The Central Flint Co. is reported to have filed a mortgage with the Mercer Trust Co. to secure \$25,000 of 6 per cent. bonds.

Boston, Ga.—An election is to be held January 14 to vote on \$12,000 of 5 per cent. water-works bonds.

Canton, N. C.—It is reported that a bill is to be introduced in the Legislature authorizing an issue of \$65,000 of water, sewer, street and school bonds. Address Mayor Curtis.

Carrollton, Ga.—It is reported that the people of Carroll county are agitating the question of issuing \$35,000 of bonds in aid of the proposed agricultural and mechanical school.

Ceredo, W. Va.—At the election November 6 the city voted to issue \$15,000 of 6 per cent. 3-15-year school-building bonds.

Chattanooga, Tenn.—It is reported that application is to be made to the Legislature by the Hamilton county court for authority to issue \$75,000 of high-school bonds.

Chattanooga, Tenn.—Reports state that it has been decided to issue \$1,000,000 of bonds as follows: \$350,000 for sewers, \$250,000 for streets, \$50,000 for parks, \$50,000 for fire halls, \$200,000 for City Hall and \$100,000 for floating debt. It is said the election will be held next summer.

Clinton, Okla.—The city has voted to issue \$20,000 of water-works bonds.

Clyde, Texas.—The \$6000 of 5 per cent. 10-40-year bonds of Clyde Independent School District are reported sold.

Collins, Ga.—The city has voted to issue \$7500 of 5 per cent. schoolhouse bonds. It is said the bonds will be placed on the market in about 60 days.

Conway, S. C.—Bids will be received by Robt. B. Scarborough, chairman Board of Commissioners of Public Works, until 11 A. M. January 22 for \$30,000 of 4½ and 5 per cent. 20-40-year public improvement bonds.

Clinton, Okla.—The city has voted to issue \$20,000 of water-works bonds.

Covington, Ga.—The city is said to have passed a resolution authorizing the issue of \$15,000 of light and street improvement bonds.

Denison, Texas.—Reports state that the city will probably issue \$20,000 of paving bonds.

Durant, I. T.—Messrs. Seasongood & Mayer of Cincinnati have purchased at a

premium of \$1107 the \$20,000 of sewer and \$15,000 of water-works extension 5 per cent. 30-year bonds.

Edgewood, Ga.—Bids will be received until noon January 14 by I. N. Brown, Mayor, for \$12,500 of 5 per cent. 30-year electric-light bonds.

Gibson, Ga.—Glascock county recently voted to issue \$15,000 of courthouse and \$2000 of jail 4 per cent. bonds.

Greenville, S. C.—C. H. Coffin of Chicago has been awarded \$15,700 of Dunklin township and \$10,500 of Oaklawn township, Greenville county, bonds.

Hammond, La.—It is stated that no sale was made December 4 of the \$40,000 of 5 per cent. 30-year water-works and drainage bonds, and that they will be re-offered in January.

Huntersville, Va.—The Consumers' Brewing Co. is reported to have issued \$100,000 of 6 per cent. bonds.

Louisville, Ky.—Reports state that the \$1,000,000 of refunding water bonds will not be placed on the market until next month.

Hamilton, Ga.—An election is soon to be held in Harris county to vote on courthouse bonds.

Newport News, Va.—An election is to be held February 28 to vote on \$100,000 of street-improvement bonds.

Prattville, Ala.—It is stated that an election is to be held to vote on \$30,000 of water-works and \$10,000 of sewer bonds.

Perry, Fla.—It is reported that \$54,000 of 6 per cent. Taylor county courthouse bonds are to be issued, the first to be sold about May 1.

Richmond, Va.—Reports state that only a portion of the \$508,000 of bonds were sold, \$30,000 being awarded the Capital Savings Bank at 101 and \$5000 to Micajah Woods, trustee, at 101½.

Richmond, Mo.—Reports state that N. W. Harris & Co. of Chicago were recently awarded at a premium of \$100 the \$28,000 of 4½ per cent. refunding bonds.

Seguin, Texas.—Another \$50,000 of Guadalupe county bonds are to be issued, it is reported.

Springfield, Mo.—An election is to be held in Greene county to vote on \$150,000 of courthouse bonds.

St. Louis, Mo.—The Suburban Telephone Co. has filed a mortgage with the Mississippi Valley Trust Co., it is reported, to secure \$600,000 of 5 per cent. bonds.

Sumter, S. C.—The city recently voted to issue \$50,000 of sewer bonds. E. I. Reardon is Health Officer, Key Box 272.

Temple, Texas.—The commissioners of Bell county will, it is stated, issue \$20,000 of bridge repair bonds.

Waco, Texas.—Reports state that the \$60,000 of 5 per cent. 30-year sewer bonds will be placed on the market in about 60 or 90 days.

Wolfe City, Texas.—The \$8000 of 5 per cent. 15-40-year water-works bonds are reported sold.

Wynnewood, I. T.—An election is to be held January 18 to vote on \$8000 of water, city and fire hall bonds.

At Delhi, La., R. H. Brown, Mayor, will receive bids for \$9000 of 5 per cent. bonds of Richland Parish School District No. 1. Further particulars will be found in the advertising columns.

The Arkansas Land Development Co. at Little Rock, Ark., is offering for sale \$100,000 of 6 per cent. five-year acre bonds. Further particulars will be found in the advertising columns.

Financial Notes.

Reports state that 50 banks have been chartered in Tennessee since January 1, 1906.

For Additional Financial News, See Page 40.]

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